February-March, 1975

The National Future Farmer

Owned and Published by the Future Farmers of America

RONALD BISCHOFF Sees A Bright Future In Agriculture

The National FFA Crop Production Proficiency Award program winner from Marshall, Michigan, looks ahead to a bright future in agriculture. For himself and the thousands of other FFA members.

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Don Bailey's weight reducing program is aimed at reducing fuel consumption.

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Where he does intend to trim a few pounds, however, is from the sheet metal used in automobile bodies.

Don Bailey is a Ph.D. metallurgist working in the Research Laboratories at the GM Technical Center in Warren, Michigan. He's currently involved in a high-priority project aimed at developing lighter, yet stronger metal parts for car bodies.

All other factors being equal, when the gross weight of an automobile is decreased, its fuel economy increases. So a consequence of Don's extensive research and testing could be fuel and fuel dollar savings for millions of motorists.

In addition to working in the lab during the week and working out on the slopes and tennis court evenings and weekends, Don maintains an interest in running and maintaining a 17-foot jet drive runabout boat he built himself.

Don Bailey is an excellent example of the interesting people doing interesting things at General Motors.

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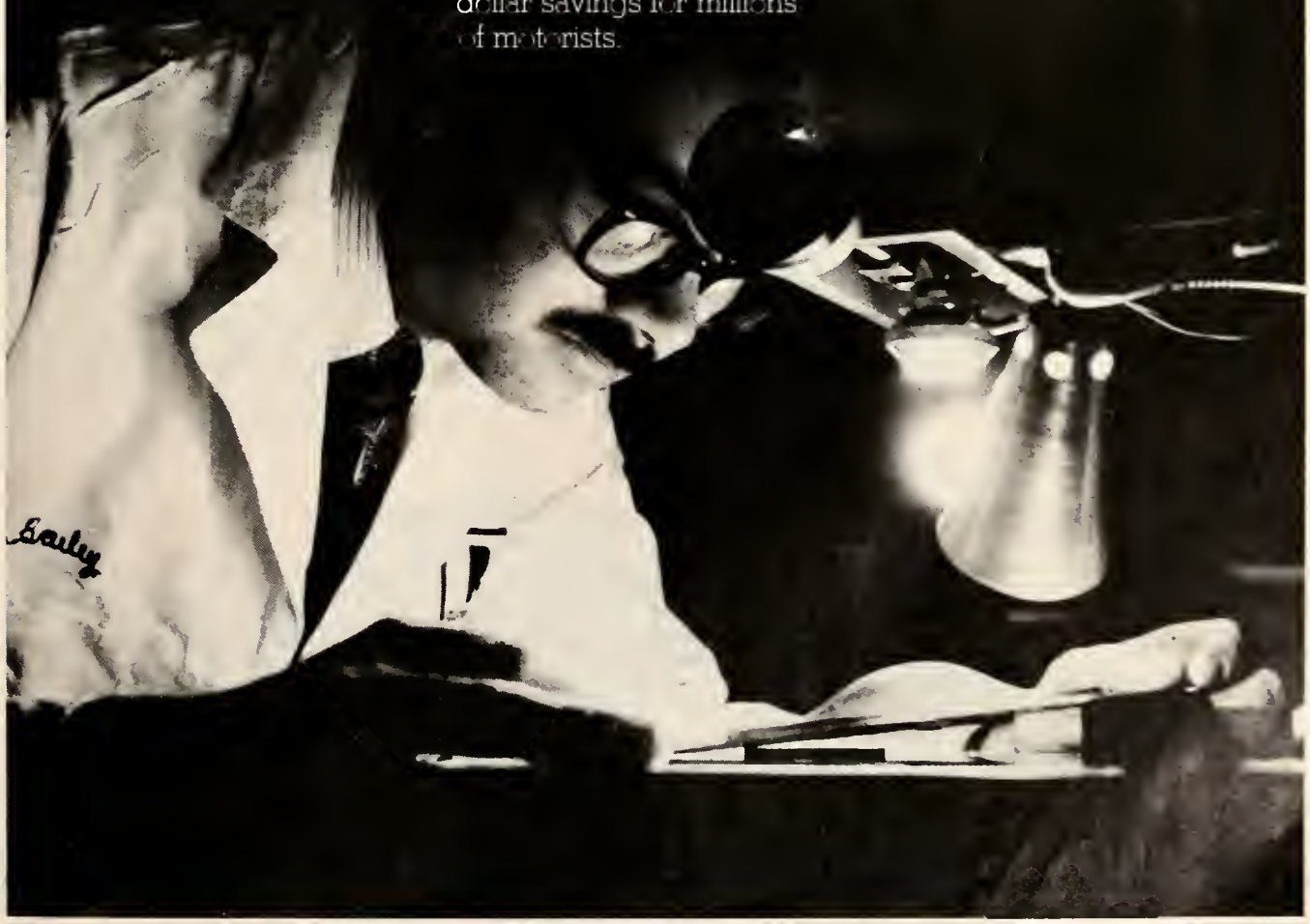

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Future Farmer
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February-March, 1975

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A Word With The Editor

Thrust '75

Thrust '75 is a term you will want to get to know. You will be hearing more about it throughout 1975.

Thrust '75 is a special emphasis program designed to promote the more effective use of FFA as a part of instruction in vocational agriculture/agribusiness. As planned, all teachers and students of vocational education in agriculture/agribusiness will eventually be involved in Thrust '75.

The objectives are specific:

1. To expand the intra-curricular use of the FFA by all vocational instructors engaged in preparing students for careers in the industry of agriculture.

2. To increase student participation and involvement in FFA activities designed to function as a part of the instructional program in agriculture.

3. To extend FFA membership to include all students enrolled in vocational agriculture.

The National FFA Board of Directors and Officers approved the concept of Thrust '75 in January, 1974. The actual kick-off will occur in April and May, when a series of two-day workshops will be held throughout the country. Six teams comprised of one National Officer and one national FFA staff member will conduct the workshops for supervisors, selected teachers, state FFA officers and Alumni representatives. Those who attend the workshops will take the message to teachers/FFA advisors who will reach every FFA member. New printed materials which will be used at the workshops will include an *FFA Advisor's Handbook* and an *FFA Activity Handbook*. Other materials will include an updated and revised *Chapter Guide*, an expanded leadership and personal development series, as well as considerable audio-visual presentations.

There is an exciting year ahead for FFA in 1975. Be sure you get in on the action.

Wilson Carnes

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The Cover

Fayetteville, North Carolina, is "in the land of cotton" and FFA Advisor W. S. Boyd and Chapter President Donald Matthews take a good close look at the '74 crop. Boyd's work with young men like Don is typical. A record number of his students have gone on to receive the highest honor available to FFA members, the American Farmer degree. (See story on Page 20.)

Cover Photo by Gary Bye

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hunting hints

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H. G. TAPPLY, Editor — Field & Stream

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Looking Ahead

Agriculture

AGRICULTURE DAY 1975—"Almost everything starts on a farm" has been accepted as the theme for Agriculture Day which will be held on March 24, 1975. Richard D. Meyocks, the Ag Day national chairman says "Agriculture Day is not a salute to farmers, but an attempt to point out to urban consumers that most products used at home and work are related to farm production."

PROMISING DDT ALTERNATIVES—A Forest Service report indicates three control materials have promise as alternatives for DDT for use in stopping future tussock moth epidemics without the adverse environmental effects of a persistent chemical. A primary Forest Service goal has been to develop alternatives to DDT. The report says the most promising materials evaluated appeared to be a chemical insecticide and two biological agents.

UNWANTED MILLIONS—According to figures from studies conducted in California on U.S. pet populations, there are about 90 million dogs and cats in this country. Millions of these are strays. By 1983 there will be 200 million if trends do not change. About 13.3 million dogs and cats are destroyed each year at U.S. humane shelters at a cost of $60 to $100 million to the taxpayer.

WASTE NOT WASTE—Poultry litter may well be a valuable byproduct of poultry production, useful in both livestock feed and fertilizer. USDA economists have determined that the processing and feeding of dried layer waste is economically feasible for poultry operation with 50,000 or more caged layers. New Jersey sources report that a 30,000 bird operation could pay for the drying equipment needed in two or three years with dried poultry waste selling at $125 a ton for fertilizer and worth $85 a ton if fed to chickens. Meanwhile, in California natural drying methods have been used to reduce moisture below 30 percent in one to five days, making poultry waste an easy to handle fertilizer.

SLOW BLOW—Wastes from beef feedlots may also have a hitherto unknown payoff for farmers who use them on their soils: besides increasing soil fertility, they also effectively restrict soil blowing on cropland lying idle over winter. Studies by USDA researchers in Kansas have demonstrated that animal wastes are about as effective as straw in restricting soil loss on highly erosive sandy soil.

GOOD REASON FOR CATTLE CONFUSION—Having trouble keeping all those new breeds of cattle straight? Well there's a good reason for your confusion. In 1920, one textbook listed only 16 breeds of beef cattle. In 1968, there were 21 breeds listed, an increase of five breeds in 48 years. But since 1968, 50 breeds are now recognized, an increase of 29 beef breeds in the past six years. Breed explosion is a result of the "exotics" imported from Europe.

HARD TO BE VET—Veterinary medical education in America faces a grave crisis, according to Gene R. Haws, reporting in the winter 1974 Vermont Veterinary Extension newsletter. According to the report, it may be harder to become a veterinarian than a doctor these days. Our nation's medical schools accept about 1 in every 2.7 students applying. Our veterinary colleges have room for only 1 in every 7.4 applicants. We have 19 veterinary colleges with average enrollments of 325. Some 1,300 new veterinarians are graduated annually. Our veterinary population in the United States totals 28,300. The loss in food due to animal diseases costs our nation $2.7 billion a year. Sufficient veterinary manpower could significantly reduce this loss.

DID YOU KNOW—That if energy were delivered to your front door like milk, today you would have found 19 half gallons of oil, 14 half gallons of natural gas, and 70 pounds of coal. With demands for energy, food, and other essentials rising rapidly throughout the world, we're all going to have to re-learn that old "waste not, want not" habit.

Why we honor people for their individual accomplishments in and out of our business

Ours is a people business. It's helping keep *people* supplied with nourishing meat, milk and eggs.

It's to *people* that we offer our products and know-how: Farmers, ranchers and feeders.

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That future depends on *people*. And in our business, we depend on capable, dedicated *people* to do our jobs well:

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- Specialists in purchasing, manufacturing, transportation, accounting, marketing, etc.
- Designers, engineers and craftsmen who produce our livestock equipment.
- More than 2,000 MoorMan Men who call *direct* on livestock producers to provide helpful, on-the-spot feed counseling.

Because we realize the importance of *people,* we like to encourage individual initiative and good work—recognizing jobs well done—*outside* our company as well as in it.

Since 1958, MoorMan's has made annual contributions to the National FFA Foundation—to help recognize and reward outstanding FFA members at chapter, state, regional and national levels.

Also since 1958, MoorMan's has sponsored the National 4-H Swine Program with awards each year to individual winners at the county, state and national levels.

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News in Brief

The FFA

THE NATIONAL OFFICERS' TOUR will run February 3-24 in 1975. Cities to be visited include Richmond, Virginia; Akron, Ohio; Indianapolis, Indiana; Chicago and Quincy, Illinois; Kalamazoo, Midland and Detroit, Michigan; Spokane and Seattle, Washington; San Francisco and Los Angeles, California; Milwaukee, Wisconsin; Fargo and Bismarck, North Dakota; Omaha, Nebraska; and Kansas City, Missouri. The purpose of the tour is to create public awareness and to build goodwill between the FFA and leaders from agriculture, business, and industry.

ALPHA TRIVETTE AND SCOTT McKAIN represented the FFA at the American Vocational Association Convention. Both attended the Executive Committee Meeting of the NVATA, and spoke at a large breakfast of agriculture teachers, supervisors, and teacher educators. The two officers also assisted by Wm. Paul Gray, National FFA Executive Secretary, and Mr. Sidney Jorden, director of vocational agriculture at the New Orleans Booker T. Washington School, erected the FFA Exhibit. FFA members from Slidell FFA Chapter in Louisiana manned the booth.

A NATIONAL CONFERENCE for national student officers and selected leaders of the six vocational student organizations will be held in Washington, D.C., January 19-22. This is a special funded project by the U.S. Office of Education to "determine the role and effectiveness of Vocational Student Organizations in Vocational Technical Education." National FFA Executive Secretary Wm. Paul Gray is monitoring the project and cooperating with the other executive officers of the VSO's in program planning and expediting of the conference. A report of the conference outcome will be completed and available to states early next summer.

THE FFA BOARD OF DIRECTORS and National Officers will convene for their regular meeting on January 27-30, 1975, at the Olde Colony Motor Lodge in Alexandria, Virginia. The Board of Directors will review among other things the possibility of having a National Farm Management Contest.

CLOUSE ADDRESSES YOUNG FARMERS—Dr. James Clouse, national FFA Alumni chairman, addressed the National Young Farmer Education Institute in Oklahoma City and requested those in attendance to make a commitment to build a strong FFA Alumni organization in their state and community. "The FFA Alumni is a good way to reunite many would-be supporters who have lost contact with agriculture," he said in his address.

FFA ADVISOR'S HANDBOOK—A new "FFA Advisors Handbook" has been developed by a committee of agricultural educators. The development and publication was sponsored by the Merck Company Foundation, a major producer of agricultural chemicals and animal health and feed products. Presentation of a $10,000 check for development and distribution of the guide was made to National FFA President Alpha Trivette.

MEMORANDUM OF UNDERSTANDING—Indiana State Director of the Farmers Home Administration J. D. Thompson signs a memorandum of understanding announcing state support for the BOAC FFA program. Also participating in the ceremony were (from left to right) Robert Orr, Lt. Governor; Harold Negley, Superintendent of Public Instruction; and Mark Lute, State FFA President.

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From the Mailbag

Readers Report

Fleetwood, North Carolina

For a journalism assignment our class has been asked to write to the editorial department of some magazine. I chose *The National FUTURE FARMER* because I think it's the best youth magazine in circulation. I read the magazine with interest.

In the October-November issue I was glad to see the section "Follow the Stars." This gives everybody a chance to picture the top four farmers and agribusinessmen across America, whether or not they see the film "Stars Over America—1974." I hope this section will be continued in the future. I also liked the cover featuring President Ford with Mark Mayfield.

Dwight Hartzog

Boort, Victoria
Australia

I am enclosing a personal check to cover the cost of the FFA magazine.

I am presently teaching in the Boort High School, Victoria, and feel the FFA magazine can provide me with information to aid in my teaching here.

I was in the FFA during high school and am aware of the inspiration the organization can provide a student and hope to use the plan here.

LeRoy Jons

Hunter, Oklahoma

We always enjoy your magazine when it arrives but we send special congratulations for a superb job with the December-January issue.

Our son Brad was an American Farmer this year and your coverage of the Convention is outstanding!

I am anxious to obtain two extra issues of this magazine and I am enclosing payment.

Mrs. Clifton Hildabrand

LaHabra, California

The Sonora-LaHabra Chapter has agreed and accepted President Ford's challenge by planting a winter crop. This crop consists of broccoli and cabbage. Also we try to conserve our energy as much as possible.

We would very much like to know in what other ways we could participate in the WIN program.

Tom Shultis

Dade City, Florida

I feel the FFA should try to think of more ways that may help to bring some of the food prices down. And also to help raise the income farmers and ranchers get from their crops and livestock.

My opinion is that the consumer may be willing to pay these high prices, especially if farmers made more off what they produce instead of the middlemen taking in all the profits. Also it might help if the consumer was shown, told, or saw actual films of how food crops and livestock are produced. This would make them more aware of things.

I believe FFA members can do research on the rising cost of livestock and crops and find reasons for these high costs. They could also find solutions or ways which might help bring costs down, yet help the farmers' prices. The findings could be turned over to the USDA.

I hope some of these problems will be solved soon.

Nora Ross

This is a problem that will not be solved quickly and easily. Over the years perhaps something can be done about it and your letter does a pretty good job of outlining why we need vocational agriculture in our high schools and FFA members working to produce more food at a lower price yet provide the farmers with an adequate livelihood. It's a real problem and we need all the brainpower we can get in order to solve it.—Ed.

Riverside, California

I am very disappointed in that your national FFA calendar as well as your national FFA magazine do not feature the female vocational agriculture instructors.

I am sure other states have some excellent programs being directed by females. California has a well respected female instructor at Grace Davis High School in Modesto. You should feature a female agriculture instructor for career purposes and for future foresight.

We do have an up-and-coming group of female teachers that should be recognized.

Miss Karlene Taylor

Albany, New York

We were delighted that the governmental seminar for agricultural youth was used in the August-September publication of *The National FUTURE FARMER*.

We will supply you with future materials as they develop if we view them worthy of publication.

Harry Karpiak
Association in Bureau of Agricultural Education for New York

Wilmot, South Dakota

The Wilmot, South Dakota, FFA Chapter voted to give one $100 scholarship to an outstanding senior in vocational agriculture.

It will be for students planning to continue their education at a vocational school or a four year college in an agricultural career. The student must show a need for financial assistance and be enrolled during the second semester to receive the scholarship.

The applicants will be recommended to the chapter by the officers and the recipient will be selected by vote of the chapter.

Calvin Pietz, Advisor

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The horticulture program at Battle Ground High School offers a variety of learning experiences. Students learn arranging skills from advisor Hicks (left), work in student shared garden (above), and construct individual projects as gifts or for profit (below).

Horticulture is Booming At Battle Ground

IF THERE ever was a battle at Battle Ground (no one seems to know for sure) it has long since been forgotten. The people who live in this rainswept corner of western Washington State are today more concerned with getting tickets to watch Bill Walton and the Portland Trailblazers or more importantly with the urban sprawl that's slowly suffocating this once quiet farm town.

The Battle Ground FFA, for years a perennial power in agriculture production competition and projects is faced with a particular problem, fewer and fewer "farm" students. The problem though is being met, characteristic of the city's name, "head on."

The answer has come with Battle Ground's ability to adapt and expand its agricultural program to meet student needs. Today's agriculture students at Battle Ground are provided instruction by eight vo-ag instructors. Production ag still plays a key role as does agriculture mechanics.

The newest segment of the program, ornamental horticulture, is growing like a well fertilized bean stalk. "The horticulture department has grown from 90 stude[illegible] (two years ago) to 320 this year," says [illegible]-ag department head Mr. Tim Hicks. "We now have three horticulture instructors," he adds.

He goes on to explain the type of training students receive. "Students at Battle Ground can take horticulture courses for three years. The first year involves plant growth habits and general gardening and propagation skills. The second year focuses on grafting, air layering, bulb forcing, floriculture, and organic gardening. The third year class is a two-hour block combining turfgrass and greenhouse management with landscaping."

The classes are designed to train students for employment in one of the many businesses in horticulture in the Portland, Oregon, area. "Portland is a leader in the nursery and floriculture business for the West coast," says Hicks. This year students were placed in such businesses for on-the-job training.

Often class projects blend training with community service. Christmas wreaths are prepared the week before Christmas. "Each student makes two, one for a nursing home patient, the other for his family," says Hicks. Excess vegetables grown by students in their school garden are distributed in local nursing homes. Last year over 80 patients received produce. A year ago after the passing of a fellow student, the class agreed to landscape the space between two school buildings as a memorial to her. The students had taken up a collection for the costs, and future classes will maintain the area.

The Battle Ground program offers other unique experiences. A communal garden maintained by the students serves as a project for many of the students who don't have access to farm projects. "The one-half acre plot gives those who live in an apartment or have limited space at home a way to grow plants," say Hicks. The students also have over 100 home gardens.

Much of the school garden is grown organically using biological controls. "In organic gardening you don't kill insect pests you discourage them." says Hicks. Crops are planted next to one another which mutually repel bugs that plague both. "For instance," he explains, "the bush bean produces an aroma that drives away potato bugs and the potato has a smell that repels Japanese bean beetles, so we plant the two crop rows next to one another." Students also find that garlic, chive, and onion plants tend to discourage prolific aphids. And the pungent fragrance of a row of marigolds makes many species of insects absolutely nauseous. It's an age-old practice called companion cropping making a comeback in today's period of environmental concern.

If insects persist, students learn to make their own organic pesticides. One such spray is made from blended red peppers. Another alternative is biological control. Lady bugs can be purchased to control aphids at a cost of about $6.00 a gallon.

To increase crop yield students use organic fertilizer readily available from the nearby school farm.

(Continued on Page 48)

The good ol' boys just turned your .22 into a shotgun.

You read right, a shotgun.

It took three years of testing and tinkering but the boys at CCI finally came up with a way to make your .22 Long Rifle handgun or rifle shoot like a shotgun.

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They call it, clever devils that they are, the Mini-Mag Shotshell. (Also available in .22 WMR.)

For you technical types, it might be of interest to note that this new cartridge has 165 #12 pellets nestled in the plastic capsule, all of which scoot out of a handgun at 1,000 feet per second, to form a tight 12″ pattern at 15′ away.

But instead of thinking of the statistics, think of the possibilities.

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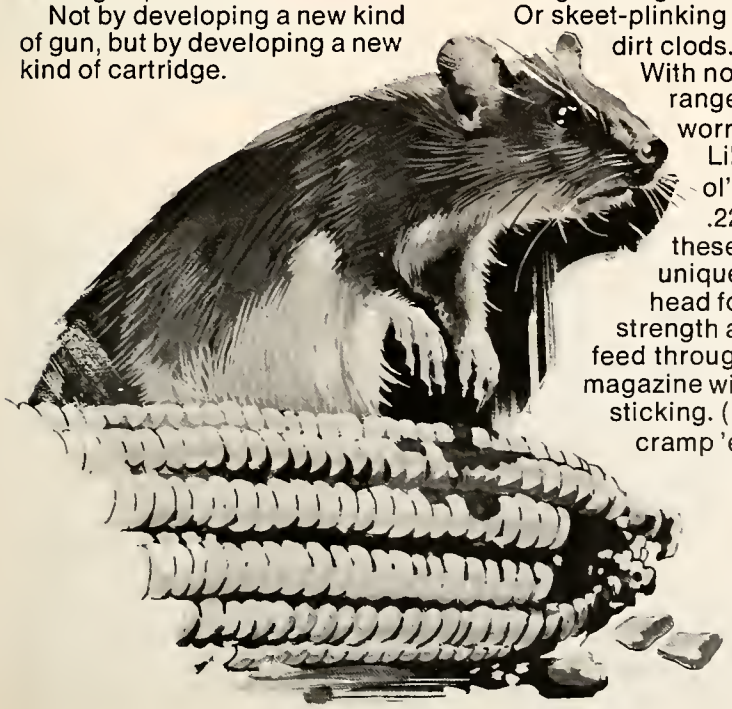

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The Little Course in the Corn Field

A quick round of golf can be fun. But what if you don't have a course. This chapter solved the problem—in a big way.

By Jeff Quandt

MEMBERS of the Marion, Wisconsin, FFA have successfully planned and built a three-hole golf course that has been operating since August 10, 1974.

The inspiration for the golf course originated five years ago when the Marion Chapter conducted a public poll as part of its first venture in the Building Our American Communities project. The poll was intended to show the needs in our community. Our chapter drew the conclusion that recreational facilities in Marion were lacking.

After efforts at promoting a golf course produced no results, the chapter made a commitment of time and money to make a "living promotion." In the fall of 1973, tentative arrangements were made with Larry Dieck, a local farmer, for a three-year, three-hole golf course on his property. All profits would be returned to him.

Chapter members drew up plans, made elevation studies, took soil tests, and began an important drainage study. They also talked with key people such as greenskeepers and expert golfers. A plan of procedures was developed with the dates and objectives to be accomplished.

Actual construction on the course began in October, 1973, with the hauling of sand and bulldozing of the ground. The sand was thoroughly worked in with roto-tillers loaned by the members. The greens were then textured and contoured to a rough final slope, leveled and left to the winter for settling.

The following spring attention was focused on how much the greens had settled. Abnormal low spots were filled with extra dirt and two greens were tiled for drainage. Members dug 12-inch deep channels and filled them with rock and plastic.

Through Dale Maroch, greenskeeper at Riverside Golf Course, Clintonville, Wisconsin, the Marion Chapter purchased 12 pounds of Penn Cross Bent-Grass. On May 23 and 24 the three greens were seeded and rolled. With favorable spring conditions the Bent-Grass had an excellent start and after three weeks, had spread evenly over all three greens.

The next step took place in early June. Someway, somehow, the course had to be irrigated. So members proceeded to dig a 6-inch deep channel, which led from a central pump to two primary service outlets. Seven hundred feet of 1-inch plastic piping was laid down and connected to the pump.

Once the irrigation system was laid, mowing of the fairways began.

In late July water and service posts and tee markers were painted and installed. At the same time the BOAC entrance sign was completed and rigged.

A strenuous fertility program was also put into effect in which greens received a regular application of fertilizer. In August our chapter purchased cups and flags from the Clintonville Golf Course and on August 10, 1974, a long hopeful dream came true. The course was opened to the public.

One of the main reasons for the course's success, which incidently, was named Marion Hills, is due to the course layout which goes a little something like this: the first hole named "Devil's Dream" is 185 yard par three because of the especially narrow and long green. The second hole has an option of playing either 200 or 400 yards, and playing either a par 3 or par 4 respectively. It is called "Sleepy Island" due to its seemingly unhazardous position. The final hole plays from 70 to 80 yards and is also a par 3. Its name, "Heaven's Haven," reflects how easy it plays.

To publicize Marion Hills, we contacted John Campbell, sports director of WBAY-TV, Green Bay, and Bob Schultz, sports director of WLUK-TV, Green Bay.

On September 2, our advisor Mr. David Van Laarhoven, head of FFA work crews Robert Joren, and I met Mr. Campbell for a game of golf. Mr. Campbell interviewed Mr. Van Laarhoven and myself for his station. The complete film story lasted 10 minutes and was aired twice.

The following week Mr. Schultz conducted a similar interview and aired a fantastically funny story about "our little course in the corn field." In addition to television stories chapter members wrote stories for major newspapers around the state.

Our final goal was accomplished on September, 1974, when the First Annual Marion Hills Classic was instituted. The field of 15 brave golfers faced 30 degree temperatures, 20-miles-an-hour winds and a driving rain storm. After two days of playing in this weather, trophies were handed out to the winners.

Public consensus was that the course was a learning experience, meaning that duffers and pros alike enjoyed playing Marion Hills because of the many different and unusual lies from which the ball could be played. The Marion Chapter has enjoyed immensely giving the people of Marion a recreational facility and it's our hope that they will have it to enjoy for many years to come.

The three hole golf course constructed by the Marion FFA Chapter took over 1,785 man hours of labor but the project has already returned many hours of enjoyment.

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From 1854 to 1891, except during the Civil War, U. S. Army troops stationed at Fort Davis, in West Texas' Davis Mountains, patrolled the San Antonio-El Paso road and played a major role in campaigns against marauding Indians.
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96 Years Of Quality

Ride with a large-acreage farmer who previewed the power, comfort, and easy servicing of new John Deere 8430 and 8630 Tractors

April 25, 1974. Waterloo, Iowa. Seven large-acreage farmers from the U.S. and Canada met to preview the new 215-hp (175 PTO hp) 8430 and 275-hp (225 PTO hp) 8630 4-Wheel-Drive Tractors*, months ahead of announcement. Each owns a 4-wheel-drive tractor, and each had in mind improvements and refinements that he would like to see in this type of tractor.

Among them was Bruce Robinson, who farms around 850 acres near Stonington, Illinois. He likes his 7520, but would like it even better with a few improvements. He brought with him a mental list of things he would like to see, and he wasn't disappointed.

Bruce had ample opportunity to learn the details of these new tractors, to work them in the field with disks, and to observe the development and test work that went into these new products. His comments are reproduced here. You'll have comments of your own once you've examined one of these new 8430 or 8630 Tractors. They're on their way to your dealer now!

"This tractor has more torque than any machine I've ever been on."

"Well, first of all, the person who is going to drive the tractor is the one you've got to worry about. You buy a

tractor to do a job. The tractor has got to do the job—that's the first requirement. The second requirement I guess you would call creature comforts and serviceability of the machine. For example: the seat, the cab, anything that lessens operator fatigue over a long period of time. This machine certainly has the power and it certainly has the comfort.

"The torque increase in these is really something. The thing we run into—you hit a hard stretch at 1,800 rpm and you start shifting. If the torque increase is that great, and with that Quad-Range™ transmission, you'll probably never have to pull out and shift gears or stop and shift gears. This tractor has more torque—low-end torque and mid-range torque—than any machine I've ever been on. You can slow the tractor down from 6 mph with a big disk like we're pulling here . . . down to 1,000 rpm . . . then open it up, and it picks right up. That's power.

"I like that seat. That seat is going to make you some life-long friends. I sit crossways in the seat, and my dad likes to sit straight and look back. So he's running around with his neck so sore that he can't turn his head. The swivel seat is going to eliminate that. Also, he needs that extra support in his back, and so do I. The seat makes the tractor. Operator comfort is a real key if you operate it yourself.

"I would like to have one. Really the only thing wrong with the 7520 is minor things. You've added the new cab. The serviceability is one thing we have against ours. But, it looks like you've taken care of all the little things. Everything that you've done here has answered all my requests . . . solved many problems. I'm really impressed. I think you've got a winner."

*Factory-observed horsepower at 2,100 engine rpm.

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67 Degrees And Climbing

By Gary Bye

Photos by Author

Being an American Farmer is part of the tradition of Cape Fear High School.

IF you travel east from Fayetteville, toward the tobacco, cotton and grain fields of eastern North Carolina and watch carefully as you pass through the stands of young pine that are scattered through the area, you might see the facilities of an "almost new" high school named after the muddy Cape Fear River which flows nearby. Just as you might pass the school without noticing its existence you might just as easily be unaware of a distinction the high school FFA chapter holds, one of national significance.

It started almost a quarter of a century ago at Central High School, the then all-white high school, when a young man named Leonard Autry received his American Farmer degree. His vocational agriculture teacher was a young gentlemen named Mr. W. S. Boyd.

This year at Kansas City, the same Mr. Boyd watched intently from the audience as two more of his students became number 66 and 67 in the long line of American Farmers that he had coached toward this goal.

The local citizens and students of Fayetteville and even many of the American Farmer degree holders don't talk about their accomplishments with a great deal of self-importance, they just acknowledge it as something that happens "quite naturally." And in fact it seems that it does.

"This is really a farming area," says William Draughon, a local farmer and brother of two other American Farmers. "I've never seen an area where the parents are behind the boys as much, it's like one big family thing. Then of course there is Mr. Boyd."

And so it goes. Travelling through the local area it seems like every farm home has fostered at least one boy worthy of the recognition as an American Farmer. And each gives more than a little credit for his success to Mr. Boyd.

Ronald Williams received his degree in 1970 and now farms close to 250 acres of soybeans, cotton, tobacco, and corn. "I guess Mr. Boyd would be the main reason for our success," he says. "If you had the desire and ability he would really push you. It's a tradition now. You go there as a beginning high school student and you know if you have the ability and will work for it you'll receive the award."

Ray Adams who farms just down the road says of Boyd, "He helped me out a whole lot just as he helped out the rest of the boys." Adams received the degree in 1965 and now farms full time with his father. He says he still uses a lot of the basic instruction received in his agriculture classes.

Don Matthews, an early recipient of the degree retains special interest in the local chapter, since his son Donald is currently FFA chapter president. The senior Matthews remembers receiving his degree in 1957. When Mr. Matthews received his award in Kansas City young Don was barely four months old. Today at 17, Donald eagerly awaits his chance to apply for the award. He and his two younger brothers would all like to carry on the family farming tradition.

Not all of the degree holders have continued in full time farming operations. Wayne Beard who received his degree in 1966 and Sammy Warren who got his in 1969 teach at a nearby junior high school. Neither man, though, has been able to divorce himself from

agriculture. Beard maintains a small beef cattle herd after school and on weekends as well as raising soybeans. Warren helps his father farm 300 acres during the summer.

"We have a lot of family farm tradition here," says Warren. "As soon as I was big enough to get on our tractor I was put up on it and grew up liking it. My brother was also an American Farmer. Now I've got a boy who's five and I hope that he grows up learning about farming."

Wayne Beard thinks Boyd's teachings go "far beyond the classroom. He's done a lot for young men here, not only in the classroom but also in the making of that person himself. He sets a good example for you."

Boyd, modest about his own accomplishments, speaks highly of the community in which he works. "The parents here really stand behind the boys. They say—just tell us what he needs, and that's what we're going to do." says Boyd. He contends that when he does something for them they go out of their way to repay the favor three times over.

North Carolina FFA Executive Secretary, Mr. C. L. Keels, who once competed against Boyd as a teacher says, "Winning comes by tradition at Cape Fear. I'm convinced that the winning tradition is a vital factor in their success." Keels also believes that Boyd's practice of keeping in close contact with past members and their families is one of the strongest parts of the program.

Speaking with an even deeper drawl than the natives of Fayetteville, Boyd calls himself the "Mississippi missionary," since he originally came to North Carolina from that state. "I came with only a trunk full of furniture in 1946," he says. "I started teaching that year and didn't have my first American Farmer until 1952—that was Leonard Autry. I figured he would be an American Farmer because he worked so hard. Trouble was I didn't know much about it then. I bet we worked 20 hours on that application before we ever got it filled out." When Autry won, Boyd says it was an incentive to the rest of the boys—"He set an example."

What Leonard Autry started is a list of American Farmers full of family ties, generation repeats and next door neighbors that you could only find in a "close-knit rural community." For example, William Draughon named in 1963 was joined by his two brothers, David in 1965 and Harold in 1966. Vance Melvin (1954), his brother Steward (1961), and his son Tony (1974) who now farms with his father are all degree holders. And the list goes on . . .

Since 1952, only two years have gone by in which an American Farmer was not named from Boyd's chapter. In three of those years (1966, 1969, and 1973) six members were awarded the degree.

The rural Fayetteville community has not been immune to change. Old Central High School was consolidated in 1969 along with nearby Stedman High School. FFA membership now exceeds 100 and a second teacher, Mr. J. H. Jerginan, once a student of Boyd's himself, joined the ag ed staff at Cape Fear High School. The consolidation seems only to have strengthened the FFA program. Illustrating this fact next year ten Fayetteville students will seek the American Farmer degree.

Is receiving the degree worth all the work? To anyone doubting the value of the award Boyd issues some sound arguments. "By getting the award," he says, "it gives the boys a better outlook on life. They realize that they are capable of doing a little bit better, and that knowledge carries over into their personal lives and jobs."

Of course excelling in the FFA is a lot of extra work for the advisor as well as for the chapter members. But according to Boyd the leadership and pride FFA members attain through the competition justifies the effort. "If a boy learns to compete in contests and for awards, the same traits are carried into later life. Life is really nothing but competition anyway," he adds.

The game of life has treated the 67 very well. Most are now either farming full time or are involved in some related agricultural field. Many combine part-time farming with full time jobs. A large majority live right around Fayetteville.

How long will the list grow? According to Boyd at least 33 more. "When I started I set my goal for 50 and everybody laughed at me," he says with a chuckle, "now I'd at least like to see 100 before I retire."

The All American Alumni

IN keeping with their deep commitment to the purposes and goals of the FFA, 31 former FFA members from Fayetteville, North Carolina, all who had previously received the American Farmer degree, met on December 9, to charter the first American Farmer affiliate in the nation. The affiliate plans to hold "charter membership" open to American Farmers for a short while and then open it up for the broader eligibility. "Chartering such an affiliate gives us a good foundation on which to build our membership," says newly elected chairman Wayne Beard.

The American Farmers in attendance were predominately graduates from Central High School which has since been consolidated into Cape Fear High School. Also adding to the chapter membership were former American Farmers from Stedman High School.

Cape Fear FFA Chapter President Don Mathews described to the group the FFA activities that the chapter was involved in this year. Then Mr. C. L. Keels, State FFA Executive Secretary, acquainted members with the changes that had taken place in the FFA program since their departure as members.

A challenge to the alumns was made by state Alumni Chairman Mr. Landis Phillips, "...to work together to assist the local FFA in making their program even more successful then it is already."

Present Cape Fear FFA Advisor Mr. W. S. Boyd has high hopes for the organization. "We could wind up with 200 members," he adds. Noting that past FFA members have traditionally played a strong part in his vo-ag program. Boyd adds "Now that the alumni is officially organized it adds to the things that we can do."

Over thirty American Farmer Degree holders from Fayetteville, North Carolina, met December 9 to form the first all American Farmer affiliate to be chartered.

Working on German farm gave Don chance to learn about their farming practices.

WEA An experience in international agriculture

THE thought of living and working in Europe for six months appealed to Don Rhoades.

Don is a FFA member of the Jefferson Community FFA, Jefferson, Iowa. He first learned of the FFA Work Experience Abroad program from an article he had read in *The National FUTURE FARMER* magazine. Out of curiosity he decided to go to his agriculture teacher to learn more about the program.

Since Don had not grown up on a farm he felt this might be a good way to learn more about agriculture while enjoying the adventure of travel to a foreign country. His advisor, the late Mr. Dirk Miller, encouraged Don to apply and helped him secure the necessary applications.

"From that point on, things moved pretty fast," the young traveller recalls. "After filling out the forms and securing the three personal recommendations required, it wasn't long before a letter came from the national FFA office telling me I had been accepted." Don learned his host would be the Gustav Schroeder family of Haassel, Germany.

Once notified of his acceptance, Don began to prepare. He tried to learn as much about Germany as possible. Some of the things he studied were what kind of clothes he would need, the living conditions, and special German traditions. Finally a letter was written telling the Schroeders how much he looked forward to living and working with them.

Before they boarded their plane for Europe, Don and the 32 other WEA participants became acquainted with the program counselor, Mr. Bob Hinton, a past National FFA Officer. During their stay in Europe, Bob would visit each of the exchange participants at their host farm about once per month. The visit was to insure that each of the young travellers was having a good experience and that all was going smoothly.

National FFA President Alpha Trivette presents WEA certificate to Rhoades.

Living with his German family was almost better than Don had expected. The family all spoke good English so communication was no problem. By coincidence, his host brother who was 25 years old had been to America for two years with a similar exchange program.

Once settled in his new home, Don found out quickly that life on a German farm was not exactly dissimlar to that on an American farm. The Schroeder farm was 283 acres in size, used all American made equipment, and was as modern as any comparable farm here. Reflecting on his stay, Don recalls, "There were three big farmers in the area and they all competed against each other for the biggest yields. And just like American farmers they liked to compare farm equipment. They all wanted to be the best."

The farm raised wheat, rye, barley, grass seed, rape, maize, and sugarbeets. In addition the family had 40 milk cows. "Sugarbeets were the area's main crop," says Don, who admits he learned a great deal about farm crops.

Another similarity Don noted between German agriculture and our own was the effects of inflation. "The prices there are even higher than things here," he recalls. "The farmers watched the markets very carefully and always knew what things were selling for."

Don, like all WEA participants, learned early that he was going to be more than an observer in the family operation. He was allowed to run all of their machines at some time during his stay. He ran the combines, took the trailer to the elevator, and even got to run the sugarbeet digger, a machine no one outside the family had been allowed to run before.

For the work he did he was paid about 285 Marks or $130.00 per month. Of course that included room and board.

After six months with his host family Don felt like part of the family. He had his own room, ate with the family, and went almost everywhere that they did. Occasionally they would even take him on special trips. "We lived 13 kilometers from the "iron curtain" and sometimes would drive over there," he recalls.

That wasn't the only sightseeing he got to do. For a break in their work experience program, all of the WEA participants met for a two-week holiday vacation. Together they travelled to six other European countries and visited a German agricultural fair before returning to their home farm.

How did the whole experience affect this FFA member? According to Don his one regret is that he had to come home so soon. But he does plan to build on his agricultural training to attain a two year college degree in some field of agriculture.

Before entering college at least part of his time will be spent telling the local community about his trip. After six months in Europe he should have plenty to tell. But perhaps the most important story Don will tell is how farmers from two parts of the world are very much alike.

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Look up. Be looked up to.

Air Force

Frequently during the harvest operation Ron checks grain for quality and cleanliness.

Ron Bischoff: Man with Ambition

By Gary Bye

A major strength of Bischoff's operation is the home storage he has constructed.

NOT far from Battle Creek, Michigan, three curious little fellows named Snap, Crackle, and Pop gaze down from a highway sign and smile endlessly at passing motorists. The Kellogg Company in Battle Creek, for which they keep their vigil is one of the largest producers of ready-to-eat breakfast foods in the world.

Many of the people in the surrounding area work for the industry, including some of the people in Marshall, Michigan, home of Ron Bischoff, the 1974 National FFA Crop Proficiency Award winner. In fact, Ron probably could too, but independent and fond of the out-of-doors, Ron shies away from time clocks. Instead he has chosen the life of a farmer.

At the time of the award, sponsored by Funk Seeds International, Inc., Ron was farming 600 acres, most of which is rented. His main crop is corn, but to maintain soil productivity other crops are rotated on a regular schedule.

Wheat, oats, soybeans, and hay are among the most regularly grown.

"I got into productive farming back in 1969," says Ron, "when I planted one acre of corn." The DeKalb Ag Research Inc.'s incentive program supplied enough seed to plant the acre. Wanting the best yield possible Ron put all his savings into fertilizer and spray. When the crop was grown he didn't have enough cash to get it picked. "I knew there was no other way then to go out and pick it by hand so that's what I did," he says. That piece of ground yielded 125 bushels, a good yield, due in part to the fact that Ron "picked up every kernel."

The grain from that small but ambitious start was sold for $1.26 per bushel. With the much expanded operation, last year Ron averaged $3.15 per bushel. This year much of his grain is still in home storage. Storing grain increases his ability to market at the most opportune time. "I've found it's profitable to market my corn carefully as I need the money," says Ron."

The new home built storage facility, with a total capacity of 16,000 bushels is complimented by a new continuous flow dryer. The dryer which is a great aid to home storage dries from 15 to 25 percent moisture corn at 90 bushels per hour. Being able to dry his crop also allows more flexibility in harvest, as demonstrated by the fact that Ron was still combining corn in early December, with a blanket of snow covering the ground.

The grain storage was laid out and constructed almost entirely by Ron, who had an early ambition to become an architect. In addition to the storage structure Ron has also drawn up house plans for two different homes. One, for his grandfather, he also helped construct.

That work isn't the first work that Ron has done for his grandfather. In fact, his first paying job was pitching silage to his grandfather's cows. He and his brother earned 50 cents a week, sometimes walking the half mile in hip deep snow. The seven dollars Ron saved that year was the first money he put in his bank account.

As Ron grew older his earnings were to increase. At 14 years of age he was stacking bales for a neighbor for $1.00 an hour and at 16 he was riding behind his father's newly acquired baler, loading bales for two cents a bale. Some days he would put up as many as 1,500 bales. "It seemed like a lot of money at that time," laughs Ron. "Maybe we just had strong backs and weak minds."

But hard work is still a way of life for Ron who admits working in a factory shop might be easier. A lot of nights he doesn't stop work until midnight. Occasionally his girlfriend Gale gets a little mad at him for not taking time to see her often enough. But she is forgiving enough that soon she will become wife to this aspiring young farmer.

Staying ahead with critical problems such as those faced in 1974 are a challenge to Ron's resourcefulness. "We had a lot of problems last year," he says referring to the wet spring plantings, then the summer drought, and finally the early frost.

With the problems farmers now face Ron feels he has got to find ways to increase profits while reducing expenses. He found part of the answer in home storage. "My bins paid for themselves in one year," he says. Now he is trying to encourage his neighbors to invest in home storage and drying facilities." "Then I could contract to haul their grain for them and we'd all profit," he says thoughtfully.

In addition to his storage facilities Ron is the owner of several large pieces of farm equipment and many smaller implements. Newest addition to his inventory is a large wheel tractor. The tractor makes his field work more efficient and the conveniences such as an air-conditioned cab and radio make the tractor work more enjoyable, even for his mother who occasionally volunteers to do field work. "She was afraid of the big tractor at first, but once she got started, it was hard to get her off of it," says Ron.

The combine Ron uses was purchased secondhand. "It's in unbelieveably good shape." he says with pride. "My dad helps me make repairs. Since he is a machinist by trade, he is not bad help," he adds jokingly.

Ron Bischoff is unafraid to spend the money needed to increase the productivity of his enterprise. In addition to mechanical improvements, he is a strong believer in fertilizer and chemical weed and pest control. In a year when a lot of farmers were afraid to spend the amount necessary to fertilize Ron says, "I figured if I had to spend $10 to make $20 it was worth it." He relies heavily on soil tests to base his application rate on. Instead of hiring it done, he makes use of the local agriculture department's soil testing equipment.

Ron's former FFA Advisor, Mr. Floyd Beneker, says Ron was only an above average student in class, but adds quickly, "It was on his farming operation that he spent most of his energy. About his junior year he just took off, and his little project became a very big one. He especially does a good job on cropping practices."

Ron does seem uncompromising in his concern for the soil. Land is seldom used for corn production more than two years in a row. As opposed to some farmers who try to raise corn year after year, Ron says he tries to give the ground a rest, even leaving it fallow every few years to let it recover. "Fertilizer is a wonderful thing but there is nothing like rotating crops," he says.

While building his project at home Ron found the necessary time in high school to work with FFA activities. He worked on many chapter projects and served as chapter vice president, (his younger brother carried out the duties of president.) Today he is a member of the local FFA Alumni affiliate, which is very active in supporting the Marshall Chapter.

Like all young men Ron is not all business. The fondness he possesses for the out-of-doors is apparent in his hobbies—hunting and fishing. When the harvest is in, he takes time out to do some ice fishing with his grandfather. "There's nothing more enjoyable than going out on the lake and catching fish and shooting the bull. It's a lot of fun and a nice break from worrying about marketing grain," he adds.

Usually the recreation is short lived. Farming means hard work, but while it is demanding it can also be rewarding. "It gives me a feeling of productivity sitting on that combine and cutting grain which will eventually feed dozens of people," Ron says. He reveals that his belief in hard work stems from something a family friend once told him. "He said that if we find ourselves in a depression again it will be just like before, the man with the ambition will be the man who will come out on top. That thought really stuck with me."

Sometimes John Bischoff, Ron's father, warns him that he's being spoiled by the good crops and high prices. But Ron says he'll just continue to work hard if things get rough. As for being spoiled maybe he is, but just enough to know that he's not ready to punch a time clock.

Soybeans

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RAGS to riches, log cabins to mansions, a pauper to a president, are all stories of the American dream. And for many American farmers that same story could be applied to one of our country's most important cash crops, soybeans.

Today the impact of the soybean on the world's economy is especially noteworthy. Soybeans became the nation's largest agricultural export during a period when farm exports played a major role in balancing our nation's foreign trade and balance of payments. At present the U.S. produces three-fourths of the world's soybean output and Japan along with several other importers depends heavily on U.S. soybeans as a source of protein in their diets. Severe repercussions were heard when in 1973 an export quota was placed on U.S. soybean trade. In that year soybean futures prices fluctuated from a little over $3.00 per bushel to over $12.00 per bushel. U.S. sale of soybeans and other grains to foreign countries brings huge sums of money back into the U.S. economy to buy the foreign products we need.

Not long ago though the soybean was little known. In the early 1800's as the United States was experiencing growing pains and European immigrants were sailing into her harbors to start a new life, the legume crop was being introduced for hay to help feed the horses and cattle that provided America's muscle and meat. For nearly a century the soybean remained a very minor crop. Only upon the discovery of the value of soy oil did acreage begin to expand. The introduction of new varieties in the U.S. around 1900 and the heavy demand for oil during the two world wars brought a tremendous increase in production. From 1932 to 1972, American production of the soybean increased nearly a hundred fold, and the value of the crop increased almost five hundred fold. Today the soybean, which is grown commercially in 30 of the 50 states, is known as the most efficient and least costly source of protein.

Thought to have originated in southeast Asia, the soybean is the most important legume in that area of the world. It is estimated to have been cultivated by 3500 B.C. Over 1,000 varieties are known, 17 of which are commercially important in the United States. The plant itself grows about hip high in most areas of the United States. is bushy with brownish hair on its leaves, stems, and pods. The seed is contained within the pod, usually two to four within each pod. They are somewhat larger than a pea and are yellow or brown in color.

In 1973 a record 1,567 million bushels of soybeans were produced in the U.S., about one-half of which was used for export, on more than 57 million acres. Interestingly, only three percent of the protein fraction of America's soybean harvest goes for food. Sixty-five percent goes for animal feed and the remainder is for industrial products.

Despite the ever-growing awareness of soybeans by American consumers, very few shoppers have even seen a soybean. Yet we all buy food items with soybean products in them. Items such as margarine, mayonnaise, salad dressing, cooking oil, and soy sauce all include some soybean products.

Attention has recently focused on soy protein as a meat extender in the ground beef market. A recent USDA study points out that as a combination soy-ground beef blend when introduced into retail outlets might capture as much as 25 percent to 30 percent of the ground beef market. In 1973 the amount of soy protein sold as meat substitutes rose to about 100 million pounds—double the amount of the year before. Speaking at the first World Soybean Protein Conference in Germany in 1973, Mr. F. E. Horan told the delegation, "As a food, the soybean is passing from the island of small industries in the expanding markets of the world. The soybean is undoubtedly the fastest growing segment of American agriculture."

The large amounts of soybean protein used for animal production is fed as soybean meal. It is used in rations for all kinds of animals from poultry, swine, and cattle to fish, bees, and pets. Projections from some sources indicate that the animal industry will likely depend upon soybean meal to provide an increasing portion of its protein needs.

Industrial uses of soybean protein products derived from processing include adhesives for use in plywood manufacturing, wallboard manufacturing tape, joint cements, and linoleum backing. Other uses include insecticide sprays, fertilizer, and vitamin and antibiotic carriers. Soybean oil competes with other oils for use in paints, varnishes, resins, plastics, and soap.

One slight drawback that keeps soybeans from being a true "Cinderella" crop story is its failure to produce high increasing yields. They have increased only 35 percent in the last 25 years as compared to the amazing 130 percent increase in corn yields in the past 20 years. A partial explanation lies in the fact that the soybean does not respond to heavy fertilizers. This may become an advantage as fertilizer prices continue to rise. Significant value lies in the soybean's status as a legume, a plant that fixes its own nitrogen. When used as a rotation crop soybeans can supply nitrogen to alternate non-legume crops such as corn. That characteristic increases in importance with the nitrogen fertilizer shortage that farmers are now facing.

The future for soybeans labelled by some as the "super bean" has never been better. Despite a serious drought last spring 1974 soybean production was the third largest on record at 1,244 million bushels. Demand for the grain and its products is being boosted by the ever growing concern over world food shortages. Farmers in many parts of the country are searching for varieties adaptable to their particular environment. Research continues on tillage practices, new and better varieties, and better yields through fertilization.

There can be little doubt that the importance of soybeans will continue to climb as new uses are found and the acceptance and utilization of currently known products derived from soybeans becomes more widespread. The success story for the rugged little soybean may have just begun.

Safety on Wheels

Training for the Perils of Pedaling

WITH more than 80 million Americans bicycling this year and deaths due to bike collisions more than double in the last decade the bicycle has become a vehicle to be reckoned with.

One group of FFA'ers has taken a grip on the problem in Eaton, Colorado. They held a bicycle safety course for the elementary students in their community.

The 40 eager youngsters who took the course were first instructed by the members on the importance of safety. Proper riding practices and precautions were discussed. Then the students who had brought their bikes were taken to the obstacle course laid out in advance by chapter members. Before they were allowed on the course each bike was safety inspected and equipped with reflector tape. Adjustments were made on the bicycles wherever necessary. Following a demonstration by the members on the proper use of hand signals, each boy or girl was allowed to try their skill at riding through the obstacles.

To conclude the instruction phase of the course, a question and answer session was held with a local law enforcement officer.

The highlight of the program occurred when prizes were given to each youngster who had participated. Much to their delight each young cyclist received a horn, flag, or reflector for his or her bike.

Safety course for kids included inspection, demonstration, questions, and answers.

How to Cycle and Live Longer

LIKE the horse that was headed for extinction before returning to popularity, the bicycle is back. For young and old—for fun or transportation—just plain bikes or 10-speeds—in big cities or rural America—the bicycle craze has swept the country.

As with other types of transportation, the bicycle brings its own set of hazards that endanger life and limb. The National Safety Council estimated that 1,100 persons were killed and approximately 50,000 injured in bike related accidents during 1972.

A new authoritative set of bicycle safety rules has been developed by the National Safety Council in cooperation with the Bicycle Institute of America and the Schwinn Bicycle Company to provide a uniform safety guide for bicyclists.

The new safe bike driving rules are printed here so FFA members "will be in the know" and can help prevent bicycle accidents by observing these rules themselves and passing them on to others.

1. Obey all applicable traffic regulations, signs, signals, and markings. Bicycles should be driven as safely as any road vehicle, and they are subject to the same rules of vehicular traffic, wherever they apply. A good "rule of thumb" is to avoid congested streets and use bikeways, lanes or paths where possible.

2. Observe all local ordinances pertaining to bicycles. Registration and licensing, inspections, driving on sidewalks, etc. may all be covered by local laws. It is your responsibility to know them and abide by them.

3. Keep right: drive with traffic, not against it. Drive single file. Keep as close to the curb as practical. Most states require you to drive single file. When driving two abreast, a minor swerve could force you into traffic.

4. Watch out for drain grates, soft shoulders and other road surface hazards. Be careful of loose sand or gravel, particularly at corners. Watch out for pot holes.

5. Watch out for car doors opening, or for cars pulling into traffic.

6. Don't carry passengers or packages that interfere with your vision or control. A good rule is "one person, one bike," unless it's a tandem. Use baskets or luggage carriers for packages.

7. Never hitch a ride on a truck or other vehicle.

8. Be extremely careful at intersections, especially when making a left turn. Most accidents happen at intersections. If traffic is heavy, get off and walk your bike with pedestrian traffic.

9. Use hand signals to indicate turning or stopping. Let the motorist know what you plan to do by giving the appropriate hand signals for turning left or right, or for stopping.

10. Protect yourself at night with the required red reflectors and lights. Again, state laws vary. Most require a headlight, tail light or red rear reflectors for night cycling. Others require reflective pedals, additional side reflectors or other reflective material. If you are going to drive at night, use protection.

11. Drive a safe bike. Have it inspected to insure good mechanical condition. Make sure your bike fits you. See to it that brakes, pedals, lights, reflectors, shifting mechanisms, sounding devices, tires, spokes, saddle, handlebars, and all nuts and bolts are checked regularly.

12. Drive your bike defensively; watch out for the other guy. Observe the car in front of you, and the one in front of him. Leave yourself room and time to take defensive action.

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Tillage: Are we wasting fertilizer and energy—cutting yields?

Agri-Emphasis: Crops

By Frank Buckingham

CONVENTIONAL tillage could be wasting as much as two-thirds of the fertilizer and energy you put into raising a crop. It also produces a compacted subsurface where roots must try to seek moisture and nutrients.

Moldboard plowing loosens soil to a depth of 6 to 10 inches. Later tillage, planting and pesticide applications may further cover up to 90 percent of the surface with wheel tracks and consequently pack the soil tighter than it was prior to plowing. Conventional tillage also packs the soil below the plow sole so that it is too dense for rapid root growth. This means you are cheating your crop out of much of the potentially available growth space, nutrients and moisture.

However, according to Mr. Roy Morling, product development engineer with International Harvester, a new "controlled traffic" concept can overcome many of these problems. Morling is also chairman of the Controlled Traffic for Crop Production Committee of the American Society of Agricultural Engineers. He describes the new concept as farming with permanent traffic paths for all tractor and implement wheels. He says that a great deal of supporting research has been conducted by scientists and farmers—much of it at Auburn, Alabama, and led by Dr. A. C. Trouse of the National Tillage Machinery Laboratory and Mr. W. T. Dumas of the Auburn University Agricultural Experiment Station.

Soil Compaction

Auburn studies show that any wheel traffic causes soil compaction (packing), but that it can be particularly severe after plowing. Engineers and soil scientists at Auburn have also shown that wheel compaction fans out beyond the tire width. Most of the total compaction from multiple passes may result from the first wheel pass over the soil. Such compaction can restrict root growth, reduce water infiltration and storage and thus limit potential crop yields.

Serious compaction may be caused by plowing with one tractor wheel in the furrow. With big tractors, weight transfer and one wheel running lower than the other you may impose as much as four or five tons of weight on the furrow bottom. These wheels ride on loosened soil on the furrow bottom and it is this layer of soil which can become severely compacted. In addition, the cutting and working action of many tillage tools causes compaction of the soil in the lower layers while loosening the soil in the upper layers.

This compacted lower layer, commonly called plowpan, slows moisture movement and root growth into deeper soil. Then by the time dry weather hits, roots have difficulty penetrating this pan in search for moisture.

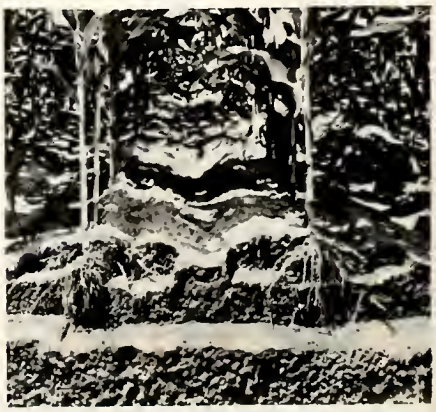
Matching implement wheels to tractor tread, using tractors with wide front axles and sprayers with the same wheel spacing reduces the potential number of compacted row middles. However, Auburn studies show that tire edges should be kept at least 12 inches from rows to avoid restriction of root growth. A 12-inch tire in a 40-inch row has 14 inches on each side, but an 18-inch tire in a 30-inch row has only 6 inches clearance each way.

When tricycle-type tractors and equipment are used, all row middles may be compacted during the growing season . . . in cotton fields some row middles receive up to 22 wheel passes after planting. Dr. Trouse refers to this as "farming in a window box." Crops are expected to grow and mature in a volume of soil as deep as the ground was plowed and 12 to 13 inches wide. The plowpan below and compacted soil on each side can severely limit potential root development and consequently reduce yields.

Tests at Auburn in which all wheel

(Continued on Page 34)

Wheel traffic and tillage equipment have compacted soil in left photo, to the plow depth, the thin hard layer near the bottom. Right photo shows increased root growth where plowpan has been plowed out and harrowsole is less dense. Only one pass has been made in each row middle causing some root restriction.



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Tillage

(Continued from Page 32)

traffic, from tillage through harvest year after year, was restricted to the permanent traffic zones, produced an 83 percent average cotton yield increase over several years. Controlled traffic plots produced higher yields every year, but the percentage difference was greater in dry years. Compaction limited water intake on conventionally tilled soils during dry years, but the larger root system of plant under controlled traffic conditions allowed them to extract moisture from a larger volume of soil.

Less Runoff

During one Auburn test 1.8 inches of runoff was collected from wheel track areas during a two-inch rain. However, the sponge-like soil in the uncompacted crop zone permitted only 0.2 inch runoff from that area. Regular soil test during controlled traffic research indicated recharging of soil moisture into the second and third foot of soil depth under controlled traffic plots followed rains of 0.58 to 0.76 inches. However, no similar recharging was observed below the conventionally tilled plots during those same rains. Heavier rains resulted in some recharging of both areas.

According to Dr. Trouse, plant roots in a good environment may grow 2½ inches per day. In slightly compacted soil this growth may drop to ¼ inch, and stop altogether in severely compacted soil. Soybeans grown in uncompacted soil in four foot wide soil bins at the tillage lab spread roots the width of the box and penetrated to a depth of six feet or more. Yet in normal field conditions roots more than two feet long are unusual.

Higher Yields

Using the same traffic paths year after year in the South appears to offer the possibility of regularly increased crop yields. However, north of the hard-freeze line, where freezing and thawing between seasons seem to partially offset soil compaction, crop yield increase has not been so clearly indicated when using permanent traffic paths.

Minnesota controlled traffic tests, though, have shown a 25 percent yield boost for soybeans and the practice may also help vegetable growers. For instance, maturity of canning peas may vary almost in terms of hours, and when peas planted in or next to wheel tracks mature at a different time than those away from wheel tracks because of compaction, grading becomes very difficult. Controlled traffic and uniform growing conditions might alleviate much of this problem.

Mr. Morling points out that yields have increased in many areas with controlled traffic farming. However, yields haven't gone up in all areas and interest in controlled traffic has lagged in those areas as a result. Mr. Morling believes though that potential reductions in production costs and fuel savings from controlled traffic farming may be more significant in some areas than the possible yield increases. Also there could be a timeliness factor—crops could be planted sooner after wet weather. By ridging the soil for earlier dry out in the spring, planting could be done earlier with permanent traffic paths.

Fuel Savings

Mr. Morling foresees potential fuel savings with controlled traffic tillage compared to conventional tillage in three areas:

1. Improved traction efficiency because wheels are always operating on a firm path and both slippage and rolling resistance are greatly reduced. Traffic paths could even be stabilized with soil additives.

2. Reduction in acres tilled because wheel zones are left undisturbed.

3. Reduction in tillage energy required in crop zones because soil is not compacted from wheel traffic during the entire crop cycle. Some studies have shown that controlled traffic prevents recompaction of some soils for several years and thus could reduce the need for annual tillage.

By comparing controlled traffic farming conditions to conditions and results found in other engineering tests, Mr. Morling estimates a possible fuel savings of 50 percent for controlled traffic farming as compared to conventional tillage operations. This savings could be increased to considerably more than 50 percent if a no-till planting or a minimum till system is used with complete traffic control.

Equipment

Right now you can't go out and buy specific equipment for controlled traffic farming. Scientists and engineers don't all agree yet as to what specific form such equipment should take, but the advantages of the practice have been pretty well proven in many areas and a number of farmers have recognized the adverse effects of compaction and are modifying their farming programs and available equipment to move in that direction.

"I dreamt weeds were selling for a dollar a pound and I had 500 acres."

Crop roots in uncompacted soil are free to penetrate and spread freely as cotton roots in this tillage test demonstrate.

What can you do now? Every little bit helps. Reduce trips over the field, maybe switch to minimum tillage or no-till planting. Use a chisel plow instead of a moldboard plow and go deep enough to break up any plowpan. When you need to plow, use larger plows with an on-land hitch. Use wide-front tractors and sprayers and work the widest possible swath with each pass through the field. Use aerial application of pesticides whenever possible, especially when soil is wet and subject to compaction.

Make every trip count by pulling more than one light-draft implement at once. You can use flotation tires on fertilizer spreaders, sprayers, wagons, and tractor front wheels. Remove extra tractor weight for light jobs and keep wheel slip down to approximately 15 percent. Growing crops on beds or ridges provides a great volume of uncompacted soil for root growth and helps provide specific traffic lanes.

Instead of accepting and taking for granted the need to follow the current all tillage practices, it's up to you to evaluate each operation. Study not only what each implement does to the soil at the time, but consider what possible harmful side effects such practices or equipment may have on water movement and storage, nutrient availability, root growth, yield, and your profit.

Helping Those With Special Needs

By Frank A. Horbert, Jr.

FFA members from Rosemary Kennedy Center present Senator Kennedy with plaque for his efforts in behalf of school.

OVER the past several years there has been tremendous success in occupational training and job placement at the Nassau County (BOCES) Rosemary Kennedy Center for Mentally Retarded Children, Wantagh, New York. Vocational agriculture is a successful part of this school's program.

Within the area of vocational agriculture, horticulture is becoming one of the largest and fastest growing occupations in the Long Island-Metropolitan New York area. The program at the Rosemary Kennedy Center came about unknowingly by the classroom teachers themselves. Many teachers began starting their own classroom horticulture programs. This created a high interest among the students in horticultural activities.

The principal, Mr. Ron Condron, and the assistant principal, Mrs. Charlotte Thomas, began looking at the success of the horticulture programs in Nassau schools and around New York State and they decided to develop a horticulture program for the mentally retarded.

The mentally retarded are excellent workers, but they too are limited to how much they can do or learn. They can be very content working at long, tedious, repetitive jobs, and they do them well. In horticulture, like in so many other jobs, there are repetitive and sometimes boring areas of work. The curriculum and lesson plans were developed into simple concrete terms and procedures. It was developed to fit the needs and abilities of the students to make them employable all year round. Skills are taught in the areas of landscape and landscape maintenance, floral design, greenhouse and vegetable production. This gives the students a well-rounded curriculum and fits them for year-round employment.

A 22 foot by 50 foot fiberglass greenhouse was immediately put to use. Seeds and plants were donated by local nurseries, growers and teachers. This combination gave the program a very good start. Students began propagating from the donations and soon the greenhouse was flourishing!

Today the Rosemary Kennedy Center has developed a fine, productive horticulture program. Through the efforts of the Work Experience Coordinator, Mr. Phil Forgash, almost all the students have been placed in related supervised work experiences and jobs. The school has now also begun development of a small animal care program which shows unlimited potential to our population.

One of the most important reasons for the growing success and achievement of the horticulture program is the introduction of FFA to the mentally retarded students in class.

Students of the Nassau County BOCES chapter proudly display their banner.

The main area of concentration in the FFA chapter is the BOAC program. The chances are slim that the chapter can produce a State Farmer or win a public speaking award. But the BOAC program has given each one of the students a feeling of individual achievement as well as group success. It gives the students (and all students with learning disabilities) a chance to be competitive. It builds individual and group leadership, along with responsibility.

A good example of this is when the chapter grew and sold plants so that they could earn money to buy their own FFA jackets. They are proud of their achievement as individuals and as a group and they show this by the way they proudly wear their jackets.

The chapter at the Rosemary Kennedy Center was fortunate to have National FFA President Alpha Trivette visit the chapter. He ignited excitement and enthusiasm among the members. They were thrilled to see that their FFA jackets were "just like his," and his sincere interest in what the chapter was doing. It is interest like this that generates all that is necessary not only to build a strong program but strong citizens.

The FFA has opened a whole new world for mentally retarded students of the Rosemary Kennedy Center Vocational Agriculture program. It has given them a greater feeling of belonging, accomplishment and acceptance among people.

This is not only true among mentally retarded students but among all children with learning disabilities. They too can be learning to do, doing to learn, earning to live and of course living to serve. The FFA can truly help all handicapped children to do this.

NEW TRUCKS

Suited for the farm or the freeway, the 1975 light duty trucks are here. Some are new but most are revised and improved versions of earlier models. Basic improvements seem to focus on fuel efficiency, rider comfort and exterior appearance. Here are a few examples of what you'll be seeing on the highways this year.

1. The newest edition to Ford's F series line-up is the F-150, a heavy duty half-ton model with a 133-inch wheelbase and a 6,050 lb. base GVW rating. Designed to perform on leaded or unleaded fuel this pickup has optional supercab to add passenger or cargo space. It also offers optional auxiliary fuel system.

2. The International model 150 replaces the 100 series. Base GVW is 6,200 lbs. and standard engine is a thrifty 304-cu. inch V8. Electronic ignition is standard on all models and an all new lighting package is optional. All wheel drive version includes "silent drive" transfer case operated from the dashboard.

3. Exterior styling improvements highlight the GMC light-duty line for 1975. A new rear end treatment consists of quick release hinge mechanism permitting fast removal and reinstallation of the tailgates. A new high energy ignition system is standard. Engine lineup includes a redesigned 250-cu. inch six cylinder.

4. Chevrolet Silverado C-10 pickup boasts top-of-the-line trim level for 1975. Light duty line offers optional glide out tire carrier, extended service intervals, and a redesigned 250 cu. inch six cylinder engine. Chevy predicts increased economy with new catalytic converter, HEI system, and outside air carburetion.

5. The all new 1975 SR-5 sport truck is a customized version of Toyota's popular half-ton pickup and heads the mini-pickup line. Truck features five-speed overdrive transmission and a new 2.2 liter engine. Toyota also offers standard and long-bed models. A new feature of all Toyota pickups is power front disc brakes.

6. 1975 Dodge D200 Club Cab Adventurer SE is one of an unchanged line of light duty model Dodge trucks. Improvements to line include new four-wheel drive transfer case as standard equipment in power wagons. Conventional and sports utility models have received completely redesigned instrument panels.

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Model A truck delivers Doug's FFA project to Minnesota Fair 25 years after completing same task for Doug's father.

Doug Pichner and his father stand next to newly renovated Model A truck. They are flanked by Owatonna FFA advisors.

A Truck With Tradition

Can a farm truck really have a personality? If you've owned the same one for four generations, it seems that way.

ONE summer day 45 years ago, a Minnesota dairyman named Thomas Pichner made a special trip to St. Paul. When he returned he did so in style, driving the latest in farm transportation—a fast and shiny Model A truck.

Today that same truck originally purchased for $600, is being used by a fourth generation Pichner farmer, Doug, an FFA'er from Owatonna, Minnesota.

"She's a truck with tradition, both in agriculture and the FFA," says Doug.

The old truck received a bit of publicity a few years ago when Doug hauled his Chester White boar to the Minnesota State Fair, to mark the twenty-fifth anniversary of the fair. Doug's father Eugene had hauled his swine entries to the first state fair in the same truck in 1948. But that bit of nostalgia was really only the highlight of a successful mechanical career.

The old "A" was the first truck of its size in rural Owatonna and quickly became the envy of great-grandpa Tom Pichner's neighbors and the pride of his six sons. The old girl was used for both work and play, hauling cream to the local creamery for all the neighbors, then toting the boys to town for their "social life."

Doug's father was born shortly after the truck arrived on the farm and remembers well growing up with the rig. "It delivered me to the old country school several times," he recalls. Summer always meant riding to the grain elevator in Owatonna with his grandfather and stopping for candy on the way home. Then there were trips to town to deliver firewood from Pichner's home sawmill to customers in town. And on one or two special occasions the local Elk's band would mount the rough flatbed as a makeshift bandstand to entertain the local community with their rhythmic tunes.

When the farm was divided in 1942, Doug's grandfather Hubert inherited half of the place and the old wheels that went along with it. Instead of cream the payload was grain threshed both on the Pichner farm and for surrounding neighbors. Bumping over rough country roads the vehicle also served as training wheels for Doug's dad who was about to enter high school.

In 1946, the Model A encountered a new four legged creature—a Chester White sow that Doug's father Eugene brought home for his FFA project. Little did Eugene or the truck realize that the pig would serve as foundation stock for the present day Pichner swine operation. "It was the desire to start my own purebred swine operation that kept me in school," recalls Mr. Pichner. "I quit twice but always went back because of vo-ag class."

In 1948, Eugene Pichner received his American Farmer degree for the swine operation that began with the delivery of that first sow. That year he began farming full time and with the farm went the aging and slightly deteriorating old truck.

As the years slipped by the old Model A passed into a sort of involuntary retirement. A new 1948 Ford truck took over much of the work she had previously done, hauling sows to the farrowing pens, moving feeders for fattening, and transporting the market hogs to market from the expanded 350-acre farm. Still she came in handy for short trips around the farm or to town. Then one day in 1963, without fanfare, she was parked in the shed. Her engine cooled for probably its last time. She had become too slow, too small, and too dull with age.

In 1973, the family finally faced the unpleasant decision. The truck had to go—the space was needed. Unless someone could take the time to fix her up. No one liked the first alternative. Parting with an old member of the family wasn't easy. So when a cousin George Pichner volunteered his mechanical skills and time the family jumped at the chance.

George worked slowly and patiently. A new engine was installed and her old dented body was straightened, painted and polished. From August through December he worked until at last the truck rolled out of his shed looking as proud as it had that summer in 1930. It was like being reborn. She had her coming out celebration at the Minnesota State Fair. Flashy and proud she rolled onto the fairground wearing an FFA emblem on her side and hauling a big Chester White boar on her bed. She was obviously glad to be back.

Doug won the State Farmer degree that year and has since graduated from high school. Like his father he has taken up farming full time. Today he has his eye on becoming a second generation American Farmer. Wanting to prove his own ability and know-how with pigs, Doug is establishing a purebred Hampshire operation and calls his prize stock "Pichner's Blue Roan." The old truck is helping him get established much the same way it had his father in '48. Mounted with a fuel tank she is a vital part of the operation. She shares the driveway with a new Ford four-wheel drive pickup which towers over her proudly. But a second retirement appears a long way off. She comes in pretty handy and as the Pichners admit, "We really couldn't part with one of the family."

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Selecting a Farm Truck

By Melvin E. Long

ON most farms, a truck is a very important piece of equipment. In fact, government economists estimate that costs of owning and operating farm trucks account for about one-fourth of the total mechanical equipment costs on a typical farm. Thus, to keep these costs in line, it's important to buy the right truck for the job and to use it effectively.

Here's a roundup of things to check into before purchasing a pick-up or medium-duty truck.

In recent years, the increasing popularity of pickups for recreational vehicle use has prompted truck manufacturers to offer even more options. Some of these can be of value for on the farm uses, or may be of interest to you if you plan to use your pickup for recreation as well as on the farm jobs.

Pick-Up Trucks

In conventional-type pickup trucks, payload capacity ranges from less than 1,000 lb. up to about 4,000 lb. Length of the load box ranges from 6½ feet to 9 feet.

In the past, the load box was traditionally placed between the rear wheels with external fenders to shield the wheels. This arrangement provides an uncluttered box. Recently, however, truck manufacturers have introduced a smooth-side version, in which the fender wells are inside the pickup box. This design provides a more stylish appearance, but the presence of the wheel wells inside the box can be a distinct disadvantage in hauling grain or livestock. In addition, the fender-side versions can be equipped with running boards, which can be a convenience in gaining access to the box from the side.

Pickup trucks can be equipped with almost every option that is available on conventional automobiles, such as power steering, power brakes, automatic transmission, air conditioning, tinted glass, and deluxe interior appointments. In fact, some manufacturers offer several versions of cab interiors, ranging all the way from the very austere and utilitarian to the very fancy and luxurious. If you plan to use your pickup frequently for personnel transportation between hauling chores, or if it is to double as a second car, the more deluxe interior is worthy of consideration.

Features and Options: Once you've determined the basic type of truck that you need, the next task is to match the load-supporting items, such as frame, springs, and wheels to the load-moving items such as engine, transmission, clutch, differential, and brakes to meet your particular needs.

Engine. For most normal requirements, the standard engine is adequate. Often, however, when you order a truck with options that increase the payload, it may be available only with larger engines to match the requirements that are going to be imposed on the truck.

The primary advantage of higher horsepower engine is the greater top speed available. There isn't much difference in the performance in the low end of the speed range. The higher horsepower engine produces savings in time spent in transporting loads but the standard engine is usually more economical in maintenance and cost.

Consider the terrain of the area in which the truck will be operating when choosing the engine. The standard engine will pull a grade by use of the appropriate lower gear ratios, but more time will be required.

Typical engine options that are not directly related to power output include heavy duty intake and exhaust valves, higher capacity cooling systems, bigger fans for high temperature operation, extra large air cleaner and oil filter for dusty conditions, and heavy-duty generators and batteries for severe operating conditions.

Wheel base. This dimension is related to the length of the load box, and is reasonably uniform among the different makes of pickups. Some manufacturers offer pickups equipped with cabs that have a second seat to provide space for a total of five passengers, in addition to the driver. In these pickups, the wheel base is lengthened so that the regular length load box can be retained.

Transmission. Typically, a three-speed, manual-shift transmission is offered as standard equipment, with options for both a four-speed manual transmission and a three-speed automatic transmission.

Brakes. Most manufacturers offer power brakes as standard or as an option. In many instances, the power brakes are of the disc variety.

Dash Instrumentation. Even though warning lights, instead of real "live" gages, are widely used on automobiles, many farm operators prefer an ammeter, oil-pressure gage, and engine-temperature gage so that they can detect developing engine difficulties before they become critical. Most pickup trucks are available with gage instrumentation

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One fifth of all U.S. families owns one or more trucks. The average life of those trucks is only 7.15 years making know-how in truck selection important.

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"BOOM or GLOOM?"

Ag Outlook for 1975

What does tomorrow hold for the changing face of Agriculture? Here's what the experts are saying.

AMERICAN farmers are entering 1975 with a new status of importance and with the business of farming being viewed with increasing appreciation by other Americans. Food and agriculture are now headline news. Farming is considered a critical occupation these days.

With this new importance has come a basic change in what the public, policy makers, and politicians expect the American farmer to provide both to the American consumer and the world.

Voices from many quarters are urging farmers to expand farm production in 1975 and thus ease tight world food supplies and soaring prices. Many farmers reinforced by the recent increases in farm prices are set to do just that. Not all producers however share that optimism. Livestock producers, for example, are more concerned now with reducing production.

In the face of high feed costs and overstocked cattle herds, the first half of 1975 will be a period of retrenchment in output of fed cattle, pork, and poultry products.

In addition to the problems livestock producers are facing, farmers face a critical situation going into 1975. This year alone, soaring production costs, led by fuel, fertilizer, and feed have knocked realized net farm income down by nearly a sixth, despite a record level of commodity sales. Indications are the "squeeze play" will continue into 1975.

And, as the cost of farming increases, so do the risks of financing another year's production costs. In 1975, farmers will be looking directly into the marketplace for returns, with little assistance from farm programs. Furthermore, next year is likely to see continuation of the twin problem of inflation and recession.

These are hard realities for the farmer. To increase his chances for financial success in such an uncertain period, farmers and Future Farmers must make decisions based on sound planning. To give you an idea of what to expect in 1975 *The National FUTURE FARMER* has compiled the following predictions condensed from the Department of Agriculture's annual Agricultural Outlook Conference.

CROPS PROJECTIONS

Wheat—High wheat prices, an open ended wheat program, prospects for continued strong demand and good fall planting weather all point to a large 1975 wheat acreage. Acreage planted to wheat for the 1975 crop may increase moderately over last year's 70

million acres. If weather is improved for the 1975 crop and yields return to more normal levels, the summer of 1975 could see average harvesting yields of from 30 bushels per acre to a new record 35 bushels. This on top of a large acreage would produce a 1975 crop of 2 billion bushels or more. However, should the growing season again be as bad as last year's, the 1975 harvest would probably differ little from 1974's 1.8 billion bushels. Demand for wheat in 1975-76 is again expected to be heavy and prices will remain high depending on size of crop, export shipments, and transportation problems.

Feed grains—It would appear the feed grain acreage may be up moderately if farmers experience a decent planting season next spring. Feed grain prices are now stronger relative to competing crops. Given average planting and growing conditions next year, it is expected that average corn yields will fall within a range of 87 to 97 bushels per harvested acre. This would produce a record corn crop and total feed grain production could bounce back 30 to 50 percent above this year's 165 million tons. With these levels, grain prices would back off from the record highs we are experiencing now and this would encourage production in the livestock and poultry industries.

Rice—A record crop last year pushed the 1974-75 rice supply to a bin busting 123 million cwt., 11 percent above the old record set in 1968-69. Domestic demand for rice should continue to grow during the 1974-75 year. Food use will likely move up from last year's 25.2 million cwt. as population increases and rice prices ease some from recent levels. Tight food grain supplies in Asia should hold 1975 world rice trade near the year's estimated high level of 7.4 million tons. The farm price of rice is expected to average below the level of $13.80 set in 1973-74 due to a large prospective buildup in U.S. stocks.

Cotton—Cotton prospects point to nearly a tenth smaller production than in 1973-74, over a tenth smaller mill consumption, and nearly a third larger exports. Although smaller acreage and production are likely, the extent of such declines is very uncertain. It is estimated that acreage will decline from this years 14¼ million to around 11 to 12 million acres. As a result production will probably be down from 1974, with upland cotton production estimated at 10 to 11½ million bales. Cotton mill use is projected at about 6½ million bales. Assuming a stronger world demand for cotton and smaller foreign production, U.S. exports could total slightly to moderately above the current season's expected level.

Soybeans and Oil Seeds—The U. S. soybean outlook is for sharply reduced supplies, continuing strong demand, minimal carryover next September 1, and high prices. A substantial increase in soybean production in 1975 would be required to avoid the continuation of tight supplies through the 1975-76 marketing year. Soybean crushings this season are expected to drop sharply, possibly to around 765 million bushels compared with last year's record 821 million bushels. Export availabilities are estimated at about 500 million bushels, down from last year. Exports will be largely limited by the tight supply situation. Use of soybean and other domestic fats and oils will likely decline in 1974-75 due to high prices, tight supplies, inflation, rising unemployment, and uncertainties about the economic outlook. These developments may lead to a decline in U.S. per capita disappearance of food fats and oils.

Tobacco—The tobacco outlook for 1975 is highlighted by prospects for U.S. cigarette consumpion to rise further from this year's record high level. Despite continuing trade barriers in key overseas markets, foreign tobacco supplies are reduced so leaf exports are expected to hold near recent high levels. Even with a larger crop this past season, we can expect another decline in carryover stocks. With larger farm quotas next year, growers are expected to harvest more tobacco so cash receipts should gain. But another rise in production expenses will limit net returns.

Fruits and Tree Nuts—The 1974-75 season will be another good year for the fruit and tree nut industries. Although this season provided the same amount of non-citrus fruit as a year ago and the prospects for the citrus crop will be record large, the prices received by growers for fresh and processed fruit for this season is likely to average near year earlier levels. The total supply of domestic tree nuts for the 1974-75 marketing season is slightly above last year's level since current holding of shelled and unshelled nuts are generally larger. Export prospects for 1974-75 vary among major fruits but movement to foreign markets, in total, may be near the levels reached in 1973-74.

Sugar—The world sugar situation in 1975 is likely to be much more stable than in 1974. Expanded acreage, largely as a result of higher prices will likely bring higher production. Prices are expected to remain fairly high during 1975. The world production of beet sugar for 1974-75 is estimated at a level of about 81 million metric tons, with a small increase in cane sugar production and substantial increase in beet sugar production.

Timber Products—If the various timber products follow the trends in consumption, trade, and production in 1974 U.S. production of roundwood (i.e., all timber products except fuelwood) is expected to decline about 6 percent below production in 1973. Despite the current slump in most of the major timber product markets, the longer run outlook is one of continued growth.

LIVESTOCK PROJECTIONS

Beef—The U. S. cattle herd probably has grown by another five to seven million head during 1974 and the largest inventory ever of feeder cattle and cows will dominate the beef supply picture for 1975. Beef supplies are expected to continue higher than a year earlier through the first half of 1975 although the margin of increase may narrow. Cattle slaughter in 1975 may be up around 8 to 9 percent from this year with all of the increase in cows and nonfed steer and heifer slaughter as ranchers reassess the size of their cow herds. Fed cattle prices in 1975 may average near 1974 prices in the $42 to $44 range with higher prices in the first half offset by lower prices in the second half. Although cow and feeder cattle prices will average lower next year than in 1974, some improvement from recent levels is expected, especially in the spring.

Hogs—If the projected patterns of farrowings and subsequent hog slaughter continues to decline as now seems likely, pork production in 1975 will be down 10 to 15 percent from this year. First half 1975 hog slaughter may be the smallest since 1966 and per capita pork consumption may be the lowest in 40 years at under 58 pounds per person, compared with 66 in 1974. With the sharply reduced slaughter supplies in 1975, hog prices will average much higher than in 1974. In the event of a bumper feed grain harvest in 1975, hog producers might begin significant expansion with a larger 1976 spring pig crop.

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Truck Special

Select a Truck

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as standard or optional equipment.

Other items that are frequently found to be of value for farm-truck use include a rear cargo light mounted on the roof of the cab to illuminate the load box area when loading or unloading at night, a storage compartment located in the wall of the load box and accessible from outside the truck, and an auxiliary fuel tank to increase the operating range between refuelings.

Four-Wheel Drive. Primary advantage of powering the front wheels is extra traction for severe ice, snow, and mud operations, and in exceptionally rough, hilly terrain. These trucks are arranged so that the drive to the front wheels can be disengaged when the truck is used on the highway. However, unless the truck is also equipped with a free-wheeling arrangement in the front wheels, the front differential gears and drive shaft are turned by the front wheels. Free-wheeling hubs allow the front wheels to turn but permit the front drive shaft and differential to remain at rest, thus reducing unnecessary wear.

Medium-Duty Trucks

Most cab-chassis trucks accept bodies ranging from 8 feet to 24 feet with maximum body and payload allowances of 1,000 lbs to 2,000 lbs. Wheel bases vary from 125 to 200 inches.

Usually these trucks are sold as a cab-chassis unit, to which you add your choice of body. Since most bodies are relatively expensive and often outlast the chassis, many farmers remove the body from their old truck and fit it to the new one. If you plan to do this, be sure to check CA dimensions (distance from cab to axle) and CE dimensions (cab to end of truck frame) to make sure your present bed will fit the new chassis.

Transmissions. Four or five-speed heavy duty manual transmissions, as well as automatic transmissions, are available for most trucks. However, the standard three or four speed manual shift is adequate for many situations.

While automatic transmissions are less efficient and have potentially higher maintenance costs, they are convenient to operate, as well as being more tolerant of unskilled drivers.

Differentials. The differential reduces and increases the torque ratio as power flows from the drive shaft to the rear axle. The higher numerical ratio produces lower forward speed, but more pulling effect.

A two-speed rear axle is often a good solution of the truck is to be used both on the highway and in the field. This provides a higher numerical ratio for field use, but permits shifting to a lower ratio for improved fuel economy and speed on the highway.

Brakes. Power brakes are standard on larger trucks and available as options on most others. They're especially desirable if the truck is to be operated in hilly terrain.

Wheel Base. All cab-chassis type trucks offer you a choice of wheel bases. The longer base provides better stability, but reduces maneuverability. If you plan to use your truck in restricted areas such as a barn lot or feed lot, you may be better off with the minimum wheel base recommended for the body length.

Springs. If you plan to carry more than the rated base load for your truck, heavy-duty or auxiliary springs are advisable. Heavy-duty springs often produce a harsher ride. But in some cases, helper springs can be made inoperative when the truck is unloaded.

Tires. These are available in a variety of tread types, ply ratings and widths. Highway tread is best if the truck will be used primarily on improved highways. For field use, an off-road tread is available, as well as a two-way tread that can also be used on the highway. Other extra traction treads include those for such uses as soft earth and snow.

Ply ratings significantly affect load carrying capacity. For satisfactory tire life, tire capacity should be matched to the expected load.

Wider tires provide increased traction and flotation for off-the-road use or on unpaved roads. Larger tires and larger wheels will give increased clearance if the truck is to be used over rough terrain.

Rating Systems. Traditional designation of 1½ to 2 ton to describe any truck larger than a pickup is inadequate for present-day trucks. These numbers, based on what once was the nominal load rating of the truck, are obviously outdated, since trucks of this size can haul considerably more than 1½ to 2 tons of cargo.

"Hey! We hit the crest! From now on, it's downhill!"

The most commonly used term in present-day rating systems is GVW—gross vehicle weight. This is the total weight of the truck: body, payload, fuel and driver. The curb weight is the weight of the empty truck, without body, payload or driver. The payload is the weight of the cargo that can be hauled, but doesn't include the truck body. So to determine the payload a truck can haul, both curb weight and weight of body installed on the chassis must be subtracted from the gross vehicle weight.

Trade-in Considerations. Options that add comfort and convenience—even status—to automobiles usually return at least part of their cost by increased trade-in value. But this doesn't hold true with trucks. The typical used truck buyer is primarily interested in the general condition, evidence of abuse, and adequate load-carrying capacity provided by spring and tire sizes.

Beyond this, even such options as power steering do little to increase the value of a used truck. So when you buy a new truck, select options on the basis of your use of them while you own the truck, rather than how they'll affect its future trade-in value.

Accessibility for Servicing: Since maintenance and servicing are essential for engine performance and life, it will pay you to check on accessibility for servicing when you are in the "looking" stage for either a pick-up or a medium-duty truck.

Start with the hood release mechanism itself. In some cases, it may be located so close to the radiator that it becomes uncomfortably warm when the engine is at operating temperature.

Also check for accessibility of the engine oil dip stick, the oil filter, the oil-filler opening; and the oil-drain plug.

Although the ignition will need a tune-up less frequently than the oil will need changing, it is still a good idea to check on accessibility of spark plugs and distributor for ignition servicing.

Also determine how well the battery is located for checking electrolyte level and adding water when needed. Check to see where the electrical fuse block is located. In most cases, you will not need frequent access to this, but when fuses do need attention, the need is usually urgent.

When trying out the cab for seating comfort and visibility, check location and angle of steering wheel in relation to the seat, and the location and accessibility of the various foot operated controls, such as accelerator, clutch, and brake pedals, and the head-light dimmer switch Keep in mind that when operating these in actual service, you may often be wearing heavy boots or overshoes, and will need room for safe, sure actuation of the pedals.

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1. Samples, complimentary, and other free copies	1,821	2,340
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I certify that the statements made by me above are correct and complete.

WILSON W. CARNES, Editor

Ag Outlook

(Continued from Page 45)

Sheep and Lambs—The 1975 sheep and lamb inventory likely will total about 15.5 million head, 6 percent below the January 1, 1974, inventory. Barring any more liquidation next year than seems likely, sheep and lamb slaughter will probably drop another 5 to 7 percent in 1975. Slaughter lamb prices will remain strong, but will be influenced by cattle prices. The feeder lamb market will likely continue relatively weak this winter as high feed costs continue to discourage lamb feeders.

Poultry and Eggs—This has been a disappointing year for the poultry and egg industries and prospects going into 1975 have not improved. Producers have been in a severe cost-price squeeze during much of 1974 and these factors will continue to affect production. Egg production may drop further during 1975 and average 4 to 6 percent below a year earlier. This drop reflects consumer demand. Per capita egg use will drop an additional six to ten eggs per person from the 294 of 1973. Egg prices are expected to remain strong during the first part of 1975. Turkey output in the first half of 1975 will be down about 13 percent from a year earlier. Turkey prices have stabilized in recent weeks and may remain near current levels in coming months.

Dairy—Although up this fall, milk production may turn down this winter and through the first half of 1975 as dairy farmers reduce feeding of high cost grain and concentrates. However, low slaughter cow prices will likely prevent a sharp rise in dairy herd culling. Although output may recover later next year, 1975 production may total slightly below this year. The cost-price squeeze currently facing dairy farmers will probably continue through early 1975. Farm milk prices may be showing only small month-to-month gains until the large stocks are worked off and milk production turns downward. Cheese prices have weakened recently and other product prices are holding steady. Milk and dairy product sales have been rising since summer. Further expected strength in butter and fluid milk sales help brighten the sales picture in coming month.

Summary—The information presented in this report represents the projections made by USDA economists based on the best information available to them. It does not represent a clear cut picture of things to come in 1975, there are too many variables to do that, such as the economy, availability of machinery, fertilizer, and pesticides. The biggest factor of all may be the weather. Will it offer ideal conditions for the farmers or hinder them with things like drought, excess rain, and early frosts? By all standards 1975 will challenge all who take part in the farming business.

Battle Ground

(Continued from Page 14)

This year the class plans to compare vegetation from the organic method with a "control" garden to measure the success of such practices.

Among other class projects students diagram, construct, and maintain bottle-gardens (also called terrariums). Last year, over 1,000 terrariums were constructed. Most went for gifts, but some students sold theirs for as much as $25.00 profit. This year plans call for 3,000 more to be produced. Once completed, continued care must be taken of the miniature gardens to keep them healthy and attractive. Pruning is done occasionally with razor blades attached to a bamboo stick.

During the past few years other projects have included the construction of a golf green at a nearby golf course, forcing thousands of tulips ordered from Holland, and installing lawn on the attractive high school campus.

Participation in several FFA horticulture contests is also a popular activity among students. Last year's team reflected their extensive training by returning home from the state horticulture contest with the first place banner.

The enthusiasm of students for the horticulture program has spread through the community. An adult class taught in horticulture had to be offered twice this year to meet the overflow enrollment that it experienced.

Ag-Co, a local farm cooperative seemed to be speaking for a large part of the community when it wrote the following note in its local magazine. "In this day of shortages, possibly even in foods, it is to the everlasting credit of vo-ag—FFA instructors that they are teaching our young people to self help. This training will stand them in good stead all their lives, knowing how to raise food, to care for trees, both fruit and ornamentals, and to take care of plants. All is necessary for our own ecology and our economy."

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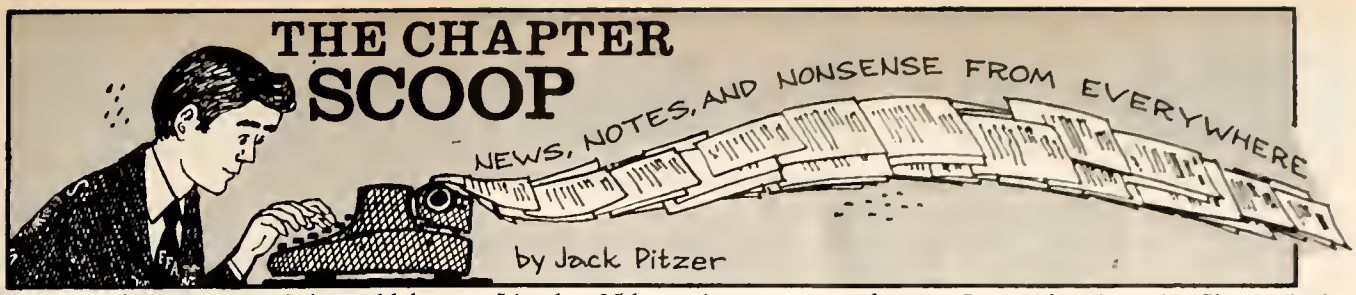

Sacks of potatoes are being sold by *Culbertson,* Montana, Chapter.

N-N-N

DeSmet, South Dakota, FFA sponsored a pork promotion contest for elementary graders.

N-N-N

Deary, Idaho, Chapter and University of Idaho Collegiate Chapter worked together on a wood cutting sales project.

N-N-N

The State FFA Alumni chairman spoke after *Doland,* South Dakota, Greenhand ceremony.

N-N-N

Beauty contestants in *Tipton,* Missouri, event are FFA and FHA initiates. Boys are girls; girls are boys.

N-N-N

Crossville, Alabama, hosted a gospel sing with three featured FFA quartets.

N-N-N

In Houston, Texas, members of *Aldine* FFA tatooed rabbits, debeaked chickens and did brucellosis testing.

N-N-N

"Our chapter made it into the movies." The *North Linn,* Indiana, FFA helped other groups remodel and reopen a local movie theater.

N-N-N

Dennis Remmers was sold by the pound at *Filley,* Nebraska, worker auction. **Duane Wiess** went by the inch. Advisor was bought by juniors and seniors.

N-N-N

Some of the profit from FFA's test plot was given to *West Concord* High in Minnesota for new scoreboards.

N-N-N

Burns, Wyoming, sponsored "scoreboard sweepstakes" for Homecoming. Cash awards were given to faculty and students who guessed correct score and total yardage.

N-N-N

Wirt County, West Virginia, members help with repair work at a youth camp.

N-N-N

Kennard-Dale Chapter in Pennsylvania sent chapter sweetheart along with officers to leadership conference.

It's the 25th anniversary year for *Okarche,* Oklahoma.

N-N-N

There is 100% FFA membership in *Longview,* Washington, vo-ag program.

N-N-N

'Tis the season for chapters to sell citrus and many are earning several hundred dollars for their treasury.

N-N-N

A farm tour for three to five-year-old Head Start kids was conducted by *Talawanda,* Ohio, FFA.

N-N-N

Four of the six officers at *Waunakee,* Wisconsin, have the last name Endres.

N-N-N

Seven *Righetti,* California, members showed sheep at the American Royal.

N-N-N

After attending church together, *Clarke County,* Virginia, members had an all-day sports event.

N-N-N

Bobby Joe Raney won first in the *Tanner,* Alabama, cabbage growing contest. His weighed 22 pounds.

N-N-N

An animal science class and home ec class switched places for a week in *Apple Valley,* California. Gals learned about cuts of meat and guys learned how it's cooked.

N-N-N

An old fashioned box supper drew some active bidding by *Mineral Wells,* Texas, FFA members for supper prepared by FHA and FFA girls.

N-N-N

Merchants in *Glencoe,* Oklahoma, and FFA put trash containers downtown. Chapter empties them regularly.

N-N-N

The annual potluck dinner with Greenhand initiation of *Livermore,* California, was a big success thanks to the officers' mothers committee.

N-N-N

Santa had *Carl Junction,* Missouri, members as helpers in a party for mentally handicapped school kids.

N-N-N

Bartow, Florida, Senior Chapter took first and the Junior Chapter took second in the Federation's opening and closing ceremony contest.

N-N-N

Grandview, Texas, Chapter conducting team performed for the PTA.

N-N-N

Jim Ghekiere was given $10.00 prize for his excellence in reciting the Creed at *Conrad,* Montana.

N-N-N

Laverne Bedillion finally beat brother **Larry** for top spot in the *McGuffey,* Pennsylvania, corn husking contest.

Denmark, Wisconsin, Chapter invited a school board member along for National Convention. He accepted chapter award with president on stage.

N-N-N

Travel money for National Convention trip from *Gallina,* New Mexico, Chapter was earned by hauling in firewood and selling it.

N-N-N

Delegates to Kansas City from *Chamberlain,* South Dakota, were sponsored by local Jaycees, Lions and Kiwanis.

N-N-N

Rick Lasher and **Ed Warner** prepared a thorough newspaper account of their week in Kansas City representing *Ridgefield,* Washington.

N-N-N

Lewisburg, Kentucky, members stripped tobacco in the shop as a fund raising project.

N-N-N

And *Martinsburg,* West Virginia, sold 135 gallons of applebutter.

N-N-N

Andy Greer reported the *Gillette,* Wyoming, Chapter's swim party at a local recreation center.

N-N-N

Amy Jo Cannarazzi of *Lincoln,* California, took novice livestock judging honors at a recent field day.

N-N-N

Hopkinsville, Kentucky, members caught 28,000 laying hens and put 'em in cages. It was fund raiser project.

N-N-N

Boaz, Alabama, FFA'ers raise cane. A one-acre plot which they'll harvest and have made into syrup and sell.

N-N-N

Westerville, Ohio, FFA adopted a male gorilla named "Bongo" at the Columbus Zoo by donating $100 for a year's care and feeding.

N-N-N

Winners of the FFA sponsored basketball tourney got trophies made by *Assumption,* Louisiana, members.

N-N-N

Break into print. Send news, notes, and nonsense into Scoop. Share the good ideas of your chapter with others.

FFA in Action

COMMUNITY'S AGRICULTURE

Homegrown

Seventy-one members of the South Jones FFA Chapter, Ellisville, Mississippi, produced over $35,000 worth of vegetables in their home garden projects last summer. J. V. Pool, Jr. vocational agriculture teacher at South Jones High School, obtained this total from records submitted by the members as they competed for $2,000 prize money. Many of the gardens were still in production into the winter.

To be eligible for the contest, the garden had to be 40 feet long and have at least 13 rows, have seven or more different vegetables and have a soil test. Contestants were judged on financial and production records, an oral test, neatness of garden and immediate surroundings, and efficient utilization of land by growing seasonal crops.

The members of the FFA chapter voted to put up $2,000 in prize money to stimulate interest in home gardens. Their ability to do this is another story in itself.

Last spring the chapter grew and sold tomato plants, and last winter they grew and sold poinsetta plants along with some azaleas.

In the shop classes they built nine flat trailers and six goooseneck trailers. They also built cattle headgates, steel gates, two rotary tractor mowers, seven power post hole diggers, and seven slip scrapers.

Each summer the students that have participated in the fund raising projects have an opportunity to make a tour of some part of the United States.

In the past they have gone to Arizona, Coloardo, Wyoming, and Tennessee. At departure time each boy is given the commission money he may have earned through sales for his spending money during the trip.

The South Jones Chapter does not spend all of their money on themselves. Last year they purchased uniforms for the cheerleaders, paid for a cyclone fence around the sidelines of the football field, planted some 100 azaleas on the school campus, and donated $400 to the Mississippi FFA Association to help pay for a swimming pool at the Grenada FFA Camp. *(Glenn See)*

Fishy Business

Some people might think there is something fishy about 11 members of Coolidge, Arizona, FFA making $100 a week in profits from a project.

And they'd be absolutely right about it being fishy, because they are participating in a tropical fish hatchery project in which they breed and sell some 29 varieties of tropical fish.

The project is now in its fourth year and Advisor Cy Henry reports the members sell an average of 1,500 fish a week to six major retail outlets in the Phoenix area.

The 11 students involved this year have a cooperative arrangement set up so that they can breed and sell the fish on a unified basis.

The profits belong to the students, "And they deserve it," according to their advisor. "They're over here at the hatchery every day after school and practically all weekend—they're really into this and the enthusiasm is tremendous."

Breeding, raising and selling tropical fish is certainly not the ordinary, run-of-the-mill agriculture program. In fact, the Coolidge project is the only one of its kind in Arizona.

The fish project got started at school four years ago when Advisor Henry was preparing to teach a summer course in biology. "Using tropical fish as a vehicle for learning about various aspects of biology just seemed like a natural thing to do," he explained.

And it was. Aside from the commercial aspects of the project, the students are learning a greal deal about genetics, pathology, and nutrition. "This is real, honest-to-goodness hands-on practical experience. When a fish dies, these students can tell you in a minute what disease killed it and how to prevent it from recurring."

Because of their acute interest in what they are doing, the project is popular and well-known at the school. In fact, the FFA has offered to supply every classroom at Coolidge Elementary School with its own fully-stocked aquarium. *(Bob Golden)*

A tropical fish project provided the learning by doing experiences for the members plus earned them some money. Because it's different, it's fun too.

Porkchop Tray

A pig earned a silver platter and a $500 check for its owner, David Ragsdale of Tuttle, Oklahoma, when the pig was named Grand Champion of the Golden Porkchop Contest held during Oklahoma's state fair.

David's 232 lb. Hampshire produced a loin eye of 10.01 square inches which set a record in Oklahoma. This Hampshire also produced a 18.35 percent ham, for a ham loin index of 183.6, highest ever registered in the contest.

David is vice president of the Tuttle FFA Chapter.

PUBLIC RELATIONS

Touring Tourists

The Hills-Beaver Creek, Wisconsin, FFA Chapter found a way to create better relations between the rural and urban citizens in their area. They developed a Farm Tour Program on local farms for tourists and any other local citizens.

(Continued on Page 52)

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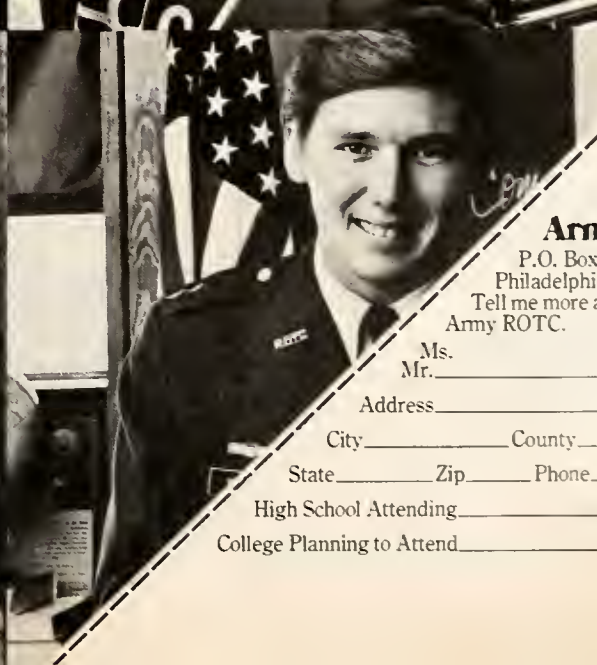

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FFA in Action

(Continued from Page 50)

Six area farmers, who were willing to conduct tours of their farming operation, were contacted.

Then the chapter secured the help of the Beaver Creek Interstate 90 Information Center. The most active days for tourists traveling through the area were decided upon, and tours were scheduled on Wednesdays, Thursdays, and Fridays of the second and third weeks in July between the hours of 9 a.m. and 3 p.m.

Posters were placed in businesses in the area as well as in various rest areas and gas stations along heavily traveled Interstate 90. Announcements were also broadcast over many radio and television stations in the area for further promotion.

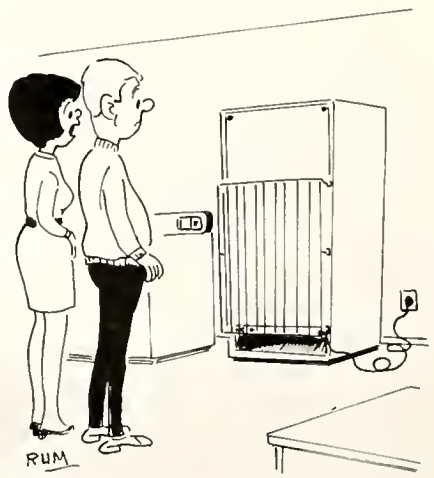
On the six days the tours were conducted, two chapter members were stationed at the Information Center along I-90 to help encourage tourists to accompany them and a local farmer on a 30-minute guided tour of his farming operation.

Other FFA members had responsibilities on the farm. They helped the farmer explain his operation and they entertained the children with horseback riding, duck feeding, and the like while their parents were on the tour. Each tour was followed by a question and answer session.

A light lunch was served and each tourist was given independent time to further look over the farming operation. *(Conley Von Wyhe, Committee Chairman)*

Chow Time

A total of 710 FFA young men and women visited Ralston Purina's Research Farm at Gray Summit, Missouri, Monday, October 14, on their way to the National FFA Convention in Kansas City.



"Mother must have told Dad that you were coming."

Members enjoyed a family-style meal after touring the research facilities.

Divided into two groups, the visitors toured the research facilities and learned of nutritional studies being conducted on many types of livestock and poultry, and also on 650 dogs and 650 cats.

After the tours, each group was served a family-style chicken dinner followed by a stage performance by the famous Purina Farm Show cast.

Galloping Giblets

The race was one to see which turkey could run the fastest half-block race.

Minnesota FFA has come up with another fun and publicity getter at State Fair time.

This year the FFA sponsored a turkey gallop. A fairground street was blocked off and a field of turkeys trotted a half-block distance.

Other "activities" of FFA at fair time include the seventh annual rooster crowing contest, the fourth annual turkey gobbling contest and an annual four-handed milking contest with TV and radio personalities and FFA members.

A live weight versus carcass weight guessing contest was held for city folks to compete with country folks in determining the dressed weight of a market steer. Hogs and sheep were also marked to show meat cuts and current prices.

Ten for Ten

Ten Wisconsin FFA Chapters took turns manning the Children's World exhibit during the ten-day Wisconsin State Fair.

The state association has helped state fair officials man an animal exhibit in other years but the petting zoo approach was organized for the first time this year.

A llama, Dexter cattle, a Shetland pony and other animals were on hand for kiddies to see and pet. The area includes a playground and a puppet show.

Each chapter worked the zoo from 8 a.m. to 10 p.m. and were provided

Youngsters with questions got answers from the members manning the exhibit.

passes to the fair, FFA T-shirts, and meals by the fair.

An informative brochure from FFA was handed out describing subjects taught in vo-ag and jobs students could qualify for after taking vo-ag.

SERVICE

Trail Makers

A year ago the members at United Chapter in Hanoverton, Ohio, began talking about a nature trail they had seen on a field trip.

In fact they began asking about some wooded area directly west of the vo-ag building. Some school maps were gotten and they found that the school owned 45 acres of woods. It had been left undeveloped and some trees had already been left to rot. The chapter decided to start a nature trail.

During this past summer a BOAC committee was organized and three chairmen, Dave Bernet, Brian Courtney, and Roger Baker, were chosen to head the project. Mr. John Dilling, one of the three chapter advisors, was picked to be an adult supervisor. As soon as permission was given the project was started. Its purpose: build a nature trail that would serve as a good

Everyone was encouraged to put in a work session in the new nature trail.

ecology study for elementary and high school students.

The members started through the woods cutting brush and trees to shape the trail. Although help was limited during the summer months, half a mile was completed. To get more help, a motion was made to exclude any Greenhand from informal initiation if he had more than 15 hours working on the trail.

Many practices have been used on the trail including thinning the productive areas of the woods, bridging over swamp land, picking trees ready for harvest, and maintaining the wildlife.

After the trail is done a local State Forester will help label plants. *(Roger Baker, Reporter)*

Camp Construction

The Lancaster, California, Chapter discovered an opportunity to offer its services in the erecting of a campground to be specially prepared for the handicapped.

Two committee chairmen, Brian Porter and Steve Mauldin, were appointed to form a work committee. Twelve members voluntarily worked at the campground every other Saturday. The first day of work consisted of digging ditches and pouring foundations. Many FFA'ers are acquiring new skills on the project.

The Mill Creek Summit Campground project is provided by the Los Angelos

(Continued on Page 54)

The work was fun and was a chance for some members to develop their skills.

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FFA in Action

(Continued from Page 53)

County Forest Service and is under the supervision of Ranger Robert Bradly. Ranger Bradly has provided much technical advice to the FFA members and the Service provided supplies for the work crew.

The campground will be used by handicapped students from county schools. It is proposed to build a nature walk for wheelchairs and detailed explantations written in braille along the trail. The facility is scheduled to open in the spring. *(Cindy Sposito, Reporter)*

MEETING IDEAS

Potatoes, Eggs and Pigs

The Norte Vista Chapter at Riverside, California, held their official Greenhand initiation in the vo-ag department. Their requirements for a student to qualify for this degree are; be currently enrolled in vo-ag, must have plans for a project, must be able to recite the FFA Creed, and have paid dues.

Forty students at Novi met these qualifications and are now Greenhands. The first event of the day was the tug-of-war between the Greenhands and the advanced members in which the Greenhands lost.

Other activities were a potato sack race, egg toss, and a wheelbarrow race. All were won by the advanced members. The last event of the day was catching the greased pigs which proved to be very entertaining. Lisa Yearwood took first place in this event.

Following these activities a pit fire was made and hot dogs and marshmallows were roasted. The day ended with a dance and friends around the campfire. *(Veronica Weakley, Reporter)*

The initiation was fun for all yet it built a strong work-together chapter.

Recruit Camp

The Columbus, Absarokee, and Rapelje FFA Chapters in Stillwater County of Montana put a new twist in their recruitment of freshmen FFA members last spring.

An annual grant of $500 has been set up by a local person for the next 20 years. The money was to be used as the chapters wished. In order to benefit the most FFA members, it was decided to put it into a recreation-leadership camp for two days and one night for incoming freshmen. By doing this, in four years' time every member in the county will benefit from the camp.

Two officers and the advisors from the three chapters met several times to discuss topics, places, meals, speakers, recreation and other details. The final plans were drawn up and it was soon time for action.

An out-of-the-way public campground up in the mountains was selected. A large tent was borrowed from a service organization; other camping equipment was rounded up and loaded into a school bus.

Programs by chapter officers and past state FFA officers explained parts of the FFA Organization and the vo-ag program. This gave the incoming freshmen exposure to the total program. They had a chance to ask questions and enjoy the fellowship and recreation of the group or be by themselves or in small groups.

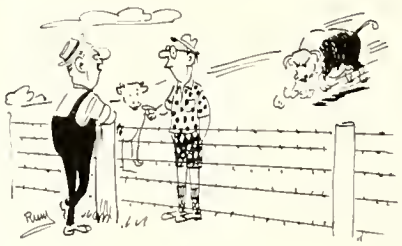
The camp was a great success and another one (with some changes and improvements) is planned for next year. *(Don Owens, Columbus, Advisor)*

Flower Girls

Two of the Derry, Pennsylvania, FFA horticulture students were selected for their school's homecoming court. Diane Lupyan and Debbie Kline are in the floral merchandising and design program. Corsages and decorations for the event were made by hort students.

CARTOON CAPTION CONTEST WINNERS

Here are the winners of the Cartoon Caption Contest which appeared in the December-January issue of *The National FUTURE FARMER*. In cases of identical entries (and there were many) the entry with the earliest postmark was selected. Judges' decisions are final, and all entries are property of the magazine.



FIRST PRIZE $15.00

"Are you up in the air about your future?"

Denise Cooperrider
Pleasantville, Ohio

SECOND PRIZE $10.00

"The worst is behind us now."

Jeff Ivie
Purdon, Texas

THIRD PRIZE $5.00

"There are lots of hidden causes of accidents."

Kim Castor
Colleyville, Texas

HONORABLE MENTIONS

Each receives a binder to hold his (up to 18) issues of *The National FUTURE FARMER*.

"So if you're the type who likes the idea of wallop."

R. T. Laurie
White Deer, Texas

"A demonstration of "cow power."

Larry Dudley
Grand Junction, Michigan

"You'll begin to feel it."

Jim Bermingham
Dover, New Hampshire

"He's got a mission; he knows where he's going."

Terri Shanklin
Amherst, Wisconsin

"Believe it or not!"

Teresa Franklin
Riverview, Florida

"I'd tell you more if I could."

Bob Moss, Jr.
Tazewell, Virginia

"This may mean a long awaited departure."

Norman Herem
Absarokee, Montana

"And smack in the middle of it all—"

Pam Marquardt
Missouri Valley, Iowa

"Well! You said to fix you a sandwich and step on it!"

Ideas for Using Promotional Items For A Nationwide FFA WEEK Celebration

EACH year the nationwide celebration of FFA WEEK calls attention to vocational agricultural education and the FFA chapter in the local community.

The Organization offers a large collection of promotional items through the FFA Supply Service to help chapters conduct a thorough public relations effort during the WEEK. Order details are in the catalog plus were mailed to all chapters.

The outdoor billboard shown above has already been well received by chapters. Besides along highways, these 24-sheet billboards can be backdrops for banquets or school assemblies, in gymnasiums during basketball season, or for Children's Barnyard and fair exhibits. A miniature version for windows and posters is available.

Also a do-it-yourself Bulletin Board kit is sold for chapter PR committees to use in getting together a first-rate exhibit. It contains photos, large lettering, background covering, and an Emblem.

To get more publicity chapters can purchase recorded Radio Spot Announcements or a TV Slide with script.

These items are then taken by the reporter or other members to the media in the area. Personal delivery by FFA to the farm broadcaster or program director is a key to getting the items used.

Give away items can attract much attention for the FFA—economical ballpoint Pens and Pocket Notebooks are popular for use at fairs, large meetings, and tours. Seals to stick onto envelopes, letters, grocery sacks, or packages make economical attention getters too.

A new item for 1975 is stand-up Tent Cards for counter displays, desks, and for banquet table centers.

Only the large Poster, 17 by 22 inches, lists dates for the celebration—and they can be clipped off for longer use.

Several items are designed for use on automobiles. The Car Top Display Sign, above, the Bumper Strip, and the Litter-bag, right, all will gain publicity.

These placemats in restaurants and in other eating places in your town can create public awareness for FFA. Also they can be used by church, civic, or school groups for banquets and meals.

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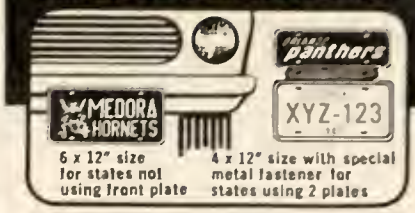

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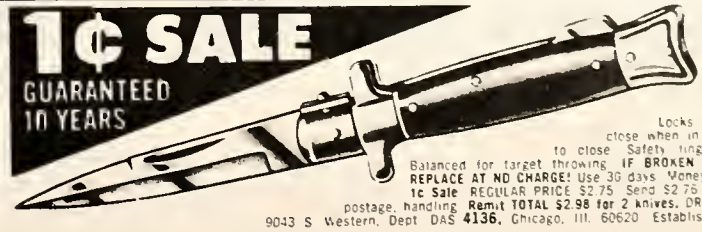

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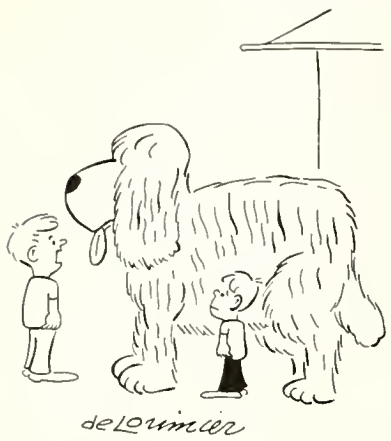
Hillbillies are strange sometimes. One feller didn't kiss his wife for years, but shot another feller who did!

Wesley Thorn
Carthage, Missouri

"The hardest thing about climbing the ladder of success is getting through the crowd at the bottom."

James Turnage
Snow Hill, North Carolina



"Whatever you do, don't say roll over."

A forty-year-old man talking to a barber, *"Man, my wife said she looks good in something long and flowing."*

Barber: *"What did you buy her?"*

Man: *"Nothing, I threw her in the river."*

Tracy Gordon
Moro, Arkansas

Al: *"Did you miss school yesterday?"*

Bob: *"Not a bit."*

Bill Ryan
Visalia, California

Ted: *"How do you describe a crow's caw?"*

Ned: *"How?"*

Ted: *"Fowl language."*

Lewis Sykes
Stanwood, Washington

"Pardon me, said the stranger, *"are you a resident here?"*

"Yes," was the answer, *"I've been here going on 50 years. What can I do for you?"*

"I'm looking for a criminal lawyer. Do you have any her·?"

"Well," said the old timer, *"we've never been able to prove it."*

Ernest Trujillo
Hickman, Kentucky

A Greenhand teenager was applying for a job at a farm. To the farmer's astonishment he was asking a high salary. The boy replied, *"It's harder to work when you don't know what you're doing."*

Reese Marshall
Newman, California

The TV installer drove out to the back woods to deliver a new TV set.

"Now this will have to go on the roof," he said pointing to the antenna.

"Like I said, Mike," said Jean to her husband, *"one thing leads to another. Now we need a roof on the house!"*

Brian Pitts
Ramona, South Dakota

Harry's teacher came to visit his mother. Harry answered the doorbell.

Teacher: *"Is your mother in?"*

Harry: *"She ain't home."*

Teacher: *"Where's your grammar?"*

Harry: *"She's in the kitchen cooking."*

Rex Curry
Waterford, Ohio

Teenage girl to her date: *"Let me put it this way, Charlie. If our romance were on television, I'd switch channels."*

Deena Vickers
El Portal, California

Bob: *"What did the corn say to the corn picker?"*

Bill: *"I don't know."*

Bob: *"You stop pulling my ears or I am going to get tough!"*

Roy Combs
Checotah, Oklahoma

Teacher: *"What is a groundhog?"*

Carl: *"A sausage."*

Alice Gipson
Bunnell, Florida

Mrs.: *"Whenever I'm down in the dumps I get a new hat."*

Mr.: *"Oh, so that's where you're getting them."*

David Lightfoot
Auberry, California

Question: *When is a piece of wood like a king?*

Answer: *After it is made into a ruler.*

John P. Jones
Whatley, Alabama

Reporter: *"Gentlemen, are you worried about rising food prices?"*

Farm Boy: *"No. Because if things get really bad, we can always eat our forest preserves."*

City Boy: *"Yeah, and we can eat our traffic jams."*

Timmy Miller
Temple, Texas

Charlie, the Greenhand

"...again I want to thank you for coming to this luncheon meeting and for all 'agreeing' to serve on the chapter banquet cleanup committee!"

The National FUTURE FARMER *will pay $2.00 for each joke selected for publication on this page. Jokes must be submitted on post cards addressed to* The National FUTURE FARMER, *Alexandria, Virginia 22309. In case of duplication, payment will be for the first one received. Contributions cannot be acknowledged or returned.*

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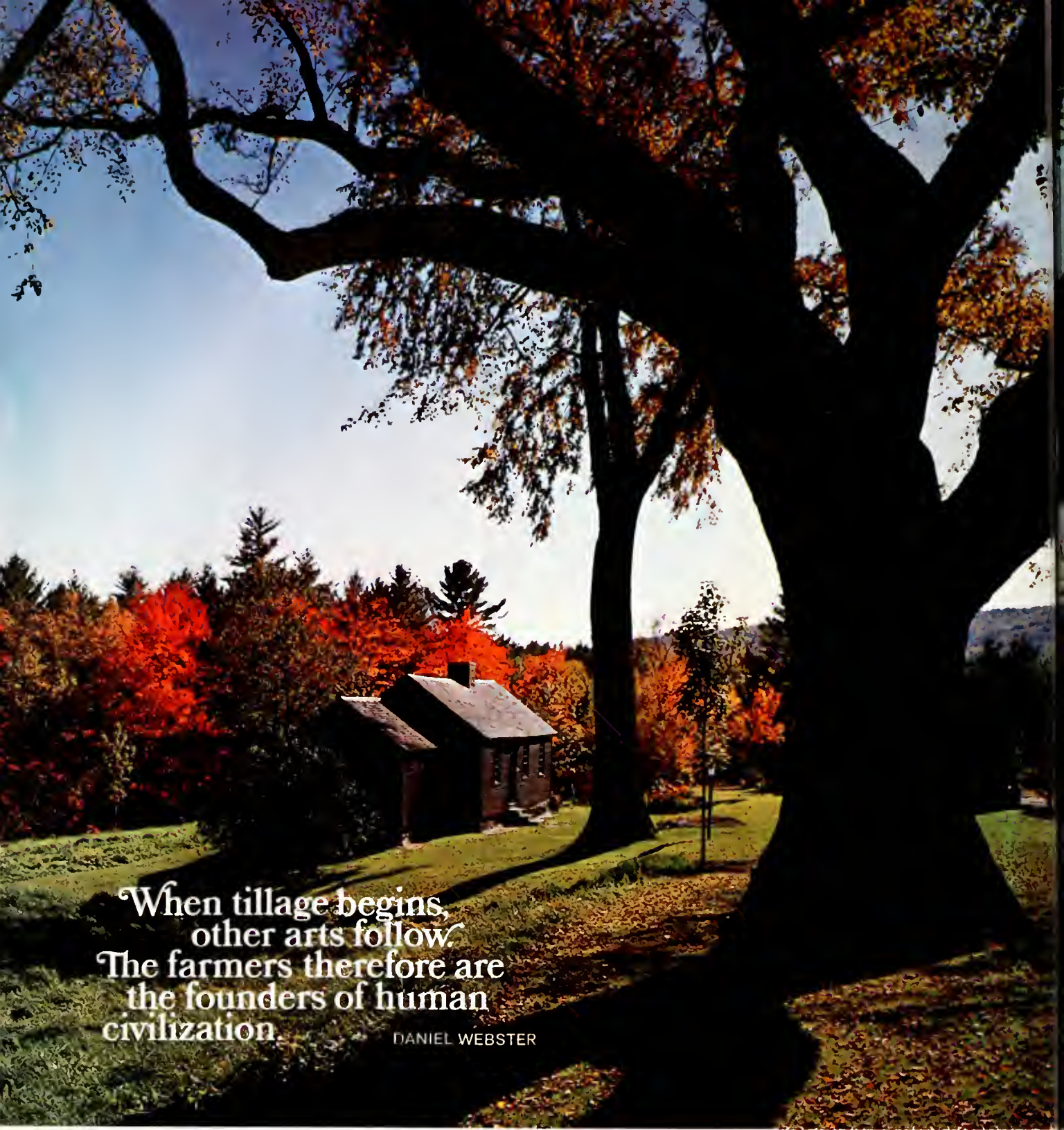

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The hand. The plow. The good earth. Hard and honest labor. From these simple things spring an abiding trust in the land and a deep awareness of the dignity of farming as a way of life. To the men and women whose lives contribute to this tradition we extend our gratitude and respect. You have helped make farming a proud heritage...our country a great nation.

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